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COMBINED PROCEEDINGS

2008 AND 2007

NATIONAL EXTENSION WORKSHOPS

Poultry Science Association Annual Meeting

Niagara Falls, Ontario, Canada

July 21, 2008

and

**Joint Animal, Dairy, and Poultry Science
Association Annual Meeting**

San Antonio, TX

July 10, 2007

Edited by

Jennifer Timmons, University of Maryland

Jacqueline Jacobs, University of Kentucky

Richard Reynnells, USDA/CSREES/PAS

United States
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Agriculture



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PREFACE

**Richard Reynnells
USDA/CSREES/PAS**

Due to an insufficient number of papers provided for the 2007 proceedings, the 2007 and 2008 proceedings will be printed as one document.

The 2008 workshop was part of the Centennial celebration for the Poultry Science Association. Our predecessors have provided a solid foundation for our present and future success. Based on our past and present, some speakers were asked to provide their thoughts on our future, while other speakers were asked to take a comprehensive view of our poultry system, particularly in the area of animal welfare. We hope these insights are beneficial to students who are planning their career, decision makers who are shaping our system, and persons in all segments of the poultry system whose interactions and contributions create our future. We also hope that you find the proceedings enjoyable and educational.

The proceedings include speaker contact information, which is provided as Appendix A for both years. Proceedings are available through our internet site (<http://www.csrees.usda.gov/animalwellbeing.cfm>), or the USDA National Agricultural Library, Animal Welfare Information Service internet site (<http://www.nal.usda.gov/awic>), or as a hard copy upon request. Contact me at 202.401.5352 for additional copies of the proceedings from this or previous years.

2008 NATIONAL POULTRY EXTENSION WORKSHOP

Poultry Science Association Annual Meeting

Niagara Falls, Ontario, Canada

July 21, 2008

Edited by

Jennifer Timmons, University of Maryland

Richard Reynnells, USDA/CSREES/PAS

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WASHINGTON UPDATE

Richard Reynnells
USDA/CSREES/PAS
Washington, DC

The activities and observations of the National Program Leader, Animal Production Systems, are reported. The 2008 Extension Special Recognition Award is presented to Jesse and Doris Lyons. Jesse provides exceptional leadership at the University of Missouri in youth, environmental protection, and extension programming, while Doris has made extensive contributions to the American Poultry Historical Society, and has several extension duties. Progress is being made in multi-state research committees: Agricultural Bioethics (NC_temp1902) was moved to the North Central Region; both Applied Animal Behavior and Welfare (NC1029), and Improvement of Poultry Air and Water Quality (S1035) are now full research committees. Portfolio reviews are yearly (Knowledge Area (KA) 306, Environmental Stress in Animals; KA308, Improved Animal Products (Before Harvest); KA315, Animal Welfare). Project summaries submitted to the Current Research Information System (CRIS) are generally error free.

The 2009 Southern Region (Quadrennial) Poultry Extension Workshop will be in Charlotte, NC, and the Chair, Ken Anderson, requests ideas and volunteers. The 2008 National Poultry Waste Management Symposium will be in Des Moines, IA. Casey Ritz (GA), Coordinator, encourages submission of poster presentations and commercial exhibits. The 2008 Future Trends in Animal Agriculture symposium, the ninth since 2001, provides a neutral and balanced forum for opportunities to have positive dialogue on animal welfare (AW) issues. The annual Animal Welfare Assessment Contest for students at Land Grant and other universities, held at Michigan State University, now will include a component for veterinary students. The contest is an opportunity to train students in AW and animal behavior areas, and emphasizes the importance of collaboration between disciplines to address AW issues. Bioethics is simply ethics as applied to biological systems, and are thus important in discussions of AW and rights issues. Discussions of bioethics help us understand societal perspectives on animal treatment, and the numerous factors that contribute to views of restrictions or imperatives of animal use.

THE ROLE OF PROFESSIONAL SOCIETIES IN ADDRESSING BIOETHICAL ISSUES

Mike Lacy
University of Georgia

The use of animals in research and teaching continues to come under more and more scrutiny. The use of animals for food and even companionship has been questioned by some from an ethical perspective. Animal, dairy and poultry scientists obviously are trained and most interested in the science of animals, their production and use. We have left the discipline of ethics to philosophers. Bioethics is a complex, controversial and polarizing subject. Its origins go back at least to the Nuremberg War Crimes Trial, but recent advances in human medicine including stem cell therapies, cloning, genetic screening, etc. have resulted in accentuated attention to this area. Although bioethics has primarily focused on research or medical treatment related to humans, some want to apply bioethics to any living organism that can sense pain or fear. Physicians have found it necessary to insert themselves into the debate regarding medical bioethics. Animal, dairy and poultry scientists will have to make the same decision as to whether to venture into the debate regarding ethical use of animals. Doing so will be neither easy nor pleasant. Critics will claim we cannot be unbiased in such a debate, and it will be challenging to counter such arguments. Most of us believe the use of animals for research, instruction, food and companionship is certainly ethical, and it is difficult for some of us to see another side to the debate. As I consider the future of our disciplines and industries, it appears the next generation of animal, dairy and poultry scientists will have to be as well educated in ethics as in science. It will be important that these future scientists be trained and prepared to counter the argument that they are biased about the ethics of animal use simply because they are trained as animal, dairy or poultry scientists. Professional societies will need to continue to strive to be involved in the bioethics debate and provide unbiased, science based information just as they are involved today in controversial issues such as animal welfare, environmental protection and food safety.

AN UPDATE ON PAACO PROFESSIONAL ANIMAL AUDITING CERTIFICATION ORGANIZATION

**Karen Christensen
O.K. Farms, Inc.**

ABSTRACT

PAACO was established in 2004 by FASS, ARPAS, AABP, AASV, and AAAP. It serves as a non-profit organization to benefit all stakeholders, industry groups and consumer groups. The mission of PAACO is to train industry experts to audit grow out and processing facilities in a consistent, professional and knowledgeable manner. PAACO also provides non-biased, third party certification of animal welfare audit instruments. Training of auditors includes a review of industry standards and processes, audit training and field training. Completion of a comprehensive exam after the training and the completion of shadow audits are required for certification. Yearly education is required to maintain certification. Two groups have completed the broiler, table-egg and turkey training to date.

PAACO

The Professional Animal Auditing Certification Organization (PAACO) was established in 2004 to meet a growing demand for training quality auditors and validating animal welfare audits for both farm and processing facilities. The need for auditors has increased dramatically since many restaurant chains, trade organizations, and other food related organizations have required food animal producers of all species to implement animal welfare programs. These programs insure that animals are treated in a humane manner during production, transportation and harvest.

The initial demand for audits and auditors resulted in some inconsistencies in audit practices. There were instances where audits were performed by auditors that were familiar with finished product audits, but had little or no experience in live production facilities or the areas in the processing facilities that handled live animals.

This need for trained auditors was recognized by the leaders of the professional societies of both the species veterinarians and the food animal sciences. PAACO was organized in 2004 by the:

American Association of Bovine Practitioners (AABP),
American Association of Swine Veterinarians (AASV),
Federation of Animal Science Societies (FASS), and the
American Registry of Professional Animal Scientists (ARPAS).
The American Association of Avian Pathologists (AAAP) joined PAACO in 2005.

These founding organizations have both the expertise and interest in the health and well-being of animals raised for food. The veterinarian organizations have species specific information on the well-being of dairy and beef cattle, swine and poultry. FASS and ARPAS provide research, teaching and extension expertise for the advancement of animal care and handling.

PAACO's role in providing trained auditors and validating audits is reflected in its mission statement:

"Promote the humane treatment of animals through education and certification of animal auditors and to promote the profession of animal auditors. In support of this mission, PAACO also certifies audits using science-based minimum requirements."

Three board members are appointed from each founding organization to serve a staggered three-year term. Board members have specific interest and knowledge of animal well-being, best management practices and welfare audits. The board is made up of university and industry personnel that have extensive knowledge in the area of animal welfare.

In 2005, the board of directors determined that it was time for PAACO to take the lead in the area of animal auditor training and certification. Grants from Pfizer and Elanco allowed PAACO to begin its training programs and hire a part-time executive director, Mike Simpson, an experienced executive with extensive experience in livestock industry administration. Additional support comes from producer organizations including, National Pork Producers Council, National Pork Board, National Chicken Council and American Meat Institute (AMI). Auditors certified by PAACO would now be able to effectively audit the farm and processing audits initially developed by AMI and other producer groups.

A group of seventeen foundation auditors (Table 1) were identified to serve as the instructors and certified auditors so that the first group of trainees would have a certified auditor available to complete their shadow audits.

PAACO training meets the needs of all those involved in animal agriculture. This includes those that are interested in animal auditing as a profession, industry personnel that conduct first-party audits for their company, customers that conduct second-party audits of their suppliers and industry personnel that are interested in animal welfare issues. PAACO has generated international interest with attendees from Canada, Mexico, Brazil, Australia and Russia.

PAACO trains auditors for specific species. Meat animal certification is presented in a two-day training session that covers beef, swine and sheep production and harvest. The completion of a comprehensive examination and three shadow audits with a PAACO certified auditor are required to complete certification. As of May 2008, 86 individuals have attended the meat training sessions. Beef and pork are the main interest of the attendees. Three meat training sessions are scheduled in 2008.

Poultry certification is covered in a three-day training program that includes an extensive overview of broiler, turkey and layer production, professional auditor training, on-farm and processing plant training and a comprehensive examination reviewing all information. PAACO instructors have multi-disciplinary experience including an extensive knowledge of the poultry industry, welfare standards and auditing. Prospective auditors are also required to do two shadow audits with a PAACO certified auditor to complete their certification.

Two PAACO training sessions have been conducted for poultry auditors. The first session was held at the University of Arkansas, Fayetteville in 2006. This first group consisted of 76 attendees with 54 going on to complete the shadow auditing. Some participants attended to receive the educational value of the training only or are involved in animal care auditing for their

company. These participants completed the auditing course and examination, but chose not to complete the shadow audits.

The PAACO training in 2007 was held in Raleigh, North Carolina in conjunction with North Carolina State University. Fifty-five attendees participated in classroom training, field visits to production facilities, and a comprehensive examination. This group has one year to complete shadow audits to achieve full certification. The poultry training has been dominated by an interest in broiler auditing followed by turkeys and layers.

The poultry training for 2008 will again be held in Raleigh, North Carolina. This location worked well for the training with some of the University of North Carolina faculty providing the 'Poultry 101' training. The proximity of broiler, turkey and layer operations that are willing to allow the attendees to visit their facilities has provided excellent field training opportunities.

Potential auditors represent a wide range of experience and interests in the poultry industry and are screened for experience and education before being accepted to the program. Potential auditors are university personnel, industry personnel, specialists from chain restaurants and supermarkets and employees of auditing companies. Educational qualifications of the participants in the first two training sessions range from those with baccalaureate degrees to doctorates and veterinarians.

Many of the major auditing firms are requiring all of their auditors to be PAACO trained and certified. Many of the companies that are audited on a regular basis are requesting that all auditors that perform audits at their facilities be PAACO certified. This acceptance of the training and certification of auditors by PAACO will require several more training sessions before enough trained auditors will be available to fill the growing need. PAACO training to standardize auditing practices and a code of ethics and conduct will help to prevent inconsistencies that occurred initially during audits conducted in the field and processing facilities.

Another important role for PAACO is the certification of audit instruments. Although PAACO does not create audit instruments, they do certify audit instruments from other organizations that require welfare audit standards. The certification of the audit instrument assures interested parties that the audit is complete and meets minimal standards for animal care and well-being. PAACO is working with organizations such as Validus and the American Humane Association to evaluate and certify their audits and train auditors. Validus was the first group to achieve PAACO's approval for its dairy welfare program.

PAACO's web site (www.animalauditor.org) contains information about the organization, activities and training schedules. All certified auditors are listed along with their contact information.

Future plans include annual meetings to discuss current issues, and a newsletter to improve communication with all PAACO auditors and other interested parties. The executive director position is now full-time. PAACO's role in validating audits will help to standardize audits so that companies of all species can develop animal welfare plans that are science-based and meaningful.

Table 1. Foundation Auditors for PAACO , Name and Organization

James Barton, DVM, DACPV Tyson Foods
Greg Martin, PhD, PAS Penn State University
Maggie Smith, MS PMC
Tim Cummings, DVM, DACPV Mississippi State University
Bruce Stewart-Brown, DVM, DACPV Perdue Farms
Mike Morris YUM! Brands
Bob Evans, PhD, DVM, DACPV Cargill Turkey Production
Ken Opengart, DVM, PhD, DACPV Keystone Foods
Kellye Pfalzgraf, DVM Tyson Foods
Temple Grandin, PhD Grandin Livestock Systems
Dragoslav Pavlovic, DVM Silliker, Inc.
Eric Gonder, DVM, PhD, DACPV Goldsboro Milling Company
Helen Wojcinski, DVM, DVSc, DACPV Hybrid Turkeys
David Hermes, DVM, DACPV Perdue Farms
David Pyle, DVM, DACPV David A. Pyle, DVM, PLLC
Ben Johnson, DVM, MAM, DACPV Georgia Poultry Laboratory
Simon Shane, FRCVS, PhD, MBL, DACPV

PANEL: FUTURE EXPECTATIONS OF EXTENSION

A STUDENT'S PERSPECTIVE

Lindsay M. Stevenson
Auburn University

College students today are much different from college students of the past. Students starting college in the fall of 2008 were born in 1990. These students are referred to as the Millennium Generation and they expect instant gratification. They most likely do not remember life with out Nintendo, home computers, and the Internet. They have had cell phones for years and are always connected. These students are masters at multi-tasking. They can often be found studying, listening to their iPod, texting on their cell phone and talking to friends all at the same time. Taking the time to go to a library and search for information takes way too long and requires a lot of effort. Students are more likely to sit at their computer and search the Internet for information than look through a book. Even when searching the Internet, they have a short attention span. If it takes more than three clicks to find the information they are looking for, they will move on.

Traditional extension programs rely on sending information through the mail and personal phone calls. Although this approach often takes a long time, it does build strong relationships between the extension agent and the person they are assisting. This traditional approach to extension will not work with the college students of today and the future. In order for extension to be a valuable resource for this age group, extension must change to become more technologically advanced. This generation needs extension information to be available quickly. They do not want to wait for the time it takes to receive a phone call back or a piece of mail. It is much easier to send an email and get information back as attachments.

Traditional extension is no longer working for the poultry industry either. Extension personnel have had to change to an "Industrial Extension" format. The industry wants to have a personal relationship with extension personnel and to know that they are available when needed. Most of the work done with the industry involves personnel training and continuing education for employees. It also often includes a site visit by extension personnel to help detect possible causes of problems.

When most people think of the extension system, they think of the county extension agent handing out flyers and helping people with their small poultry flocks. With today's culture, the traditional county extension agent is not very useful. It is often easier for small backyard producers to contact extension personnel that specialize in the information they need than to contact their county agent. Few producers even call to receive information, and those that do are often small backyard flock owners. Most producers, even those with small flocks prefer to search the Internet for information and find downloadable information.

For extension to continue to be a valuable resource, it needs to progress technologically at the same rate as the industry/population that relies on it. Extension information needs to be more prevalent on the Internet. It is important to have up-to-date information and resources for producers and consumers. It is also important to have easy to use websites that are user

friendly. These websites must have the information easy to find and be available to be searched through Internet search engines. If an extension website provides good information in an easy to understand format, producers and consumers will continue to return to that site when they need more information.

PANEL: FUTURE EXPECTATIONS OF EXTENSION

FUTURE EXPECTATIONS OF EXTENSION: INDUSTRY PERSPECTIVE

Drew Giesen
Novus International, Inc.

Due to a situation beyond his control an abstract was not submitted.

Murray Bakst, USDA/ARS was asked to provide comments on the 2008 Farm Bill for this time slot. The title of his presentation was: "2008 Farm Bill: Research Title VII and its Impact on Federal Ag Research". The power point slides are included in Appendix B. **Karen Christensen** also provided comments regarding the industry's expectations of Extension.

PANEL: FUTURE EXPECTATIONS OF EXTENSION

A FACULTY MEMBER'S PERSPECTIVE

Tony Pescatore
University of Kentucky

The foundation of extension is to provide people with the knowledge and skills to make informed decisions that impact the quality of their life. In the beginning, the Cooperative Extension Service was the gatekeeper of information, and people attended extension programs to learn the latest information from the Agriculture College. Extension programs were viewed as social activities as much as educational opportunities. The gatekeeper role no longer exists, with information readily available from numerous sources. Our clientele have changed and will continue to change. They want instant access to information, are involved in more activities, have less time for new ones, and seem to have a shorter attention span. How we develop and deliver programs must account for these changes. The problems facing Agriculture are more complex and the need for collaboration has never been greater, and will continue to increase. Extension's greatest strength is its ability to create teams or task forces to develop programs and solve problems. Extension has access to a diverse knowledge and expertise base and must effectively utilize this talent. Our clientele demand instant access to information and extension must meet this expectation if it is to remain relevant. Land Grant Universities must continue to invest in their computer and communication infrastructure in order to fully meet our client needs. Technical support for this infrastructure and training for all extension professionals is essential to adopt new delivery methods. As we adopt new delivery methods we need to be careful that we do not lose contact with any segment of the population. Electronic communication presents extension great opportunities to expand our programs; however, we must remember there is no true substitution for personal contact. For extension to remain viable it must compete for resources and must be accountable to its clientele, stakeholders and advocates. As the competition increases for the limited resources, there will be a shift from being accountable to being justifiable. For extension to remain the reliable source of information it must be rapid, accessible, research based and above reproach.

PANEL: FUTURE EXPECTATIONS OF EXTENSION

AN ADMINISTRATIVE PERSPECTIVE

Michael D. Quart
University of Missouri

The challenge of maintaining high quality Poultry Extension programs will continue to be vexing in an environment of continued tight budgets, characterized by near-level to dwindling appropriated funding and increasing demand for educational programming. The combined crisis of adequate critical mass for future professionals along with concerns of adequate financial resources for programming requires higher education's attention. The funding challenge will require continued work to maintain, if not increase, appropriated funding by developing innovative programming. Entrepreneurship—seeking competitive funding to supplement or replace appropriated funds—will be required in all areas, including: contracts/grants, fees, gifts, sponsorships and in-kind resources.

Attempts to increase federal funding in the recent Farm Bill reauthorization clearly illustrated the continued challenges to increased federal funding for research and Extension as well as maintenance of formula funding. The funding shift to more competitive sources likely will be a continued reality with our federal partner. The most positive situation we find with our money challenges is that the United States is fortunate to have a dedicated corps of Poultry Extension professionals, who have provided and will continue to provide excellent programs. It seems clear that funding will track with program excellence.

Fortunately, program excellence is the component over which higher education has the most control and which will influence funding more than any other component. It is clear that program needs for industry will be issues-based and interdisciplinary. Such programs should also always be research or evidence-based as well as relevant, reliable and responsive. Program excellence will also require a focus on industry needs (e.g. animal welfare, food safety, waste management, housing). Extension professionals will continue to discover some of their most relevant program opportunities "in the middle" as liaisons between the poultry industry and various agencies/organizations with regulatory and/or policy missions.

Extension youth programming (4-H and FFA) must be continued and remain strong. General literacy development in these youth leaders in the broad areas of food and science is itself justification for such an emphasis. However, the connection of these programs to undergraduate recruitment is even more important.

As resources allow, the education of small-flock owners, niche market poultry producers and game bird producers will continue to be audiences with programmatic demand. These Extension customers can add to the volunteer base for youth programs and, in some instances, to general consumer demand for poultry food products.

The future of Poultry Extension will depend on broad, critical mass issues. First, the issue of recruiting, training and placing students in all disciplinary areas will be a challenge. The shortage of students in poultry science directly impacts Extension's ability to serve industry and

especially to staff for future higher education needs. Critical mass as it relates to faculty Full Time Equivalents (FTEs) in Poultry Extension will continue to be a challenge. It is clear that maintenance of faculty critical mass in existing Poultry Science Departments must be a priority. Scholarship, scientific vigor and academic leadership fall on those departments. However, universities with combined Animal Sciences Departments continue to provide a cadre of poultry science faculty and models where poultry scientists can partner with other faculty to provide a critical mass. Such partnerships, exhibited as poultry teams and centers of excellence on individual campuses, are ways to respond to faculty critical mass issues. Certainly the Midwest Poultry Consortium has been a viable response to critical mass issues.

Regional, multi-state programs have been a successful model to partner faculty resources for the good of the industry. Another possibility may be faculty positions shared by two or more states when such partnerships make programmatic sense. Expansion of existing teams, centers of excellence and consortia may also provide an avenue for funding both faculty and poultry science programming. Leadership from the poultry industry, allied industries and higher education to lift up areas for new teams, centers of excellence and consortia or expand existing ones would seem to have merit for exploration.

PANEL: EXTENSION IN THE PAST, PRESENT, AND FUTURE

YOUTH AND UNDER-SERVED AUDIENCES

Francine A. Bradley
University of California Davis

INTRODUCTION

Today's poultry extensionists are faced with pronounced staffing shortages and the challenge of educating bird owners from non-traditional clientele groups. The number of poultry extensionists and 4-H Youth Development (YD) advisors continues to decline. Many studies have addressed the issue of maintaining 4-H enrollments. Of equal, if not greater, importance is the recruitment and retention of volunteer leaders. A Master 4-H Poultry Volunteer Program was initiated in California during 2007. Master Volunteer candidates were selected from regions at the opposite end of the state from the poultry specialist. After intensive training sessions and the receipt of large personal libraries, the Master Volunteers are effectively organizing events, disseminating science-based information, and collaborating between counties. Frequent communication, written and oral, between the specialist and the Master Volunteers is keeping everyone engaged and enthused. Program delivery has significantly increased in areas where previously adult and youth 4-H poultry participants had infrequent contact with the poultry specialist. California's Game Fowl Health Assurance Program (GFHAP) is directed at the state's game fowl breeders, many of whom are from Hispanic and Asian communities. In general, most members of this clientele group do not have previous ties to Cooperative Extension (CE) or the University of California. Recruitment was the initial challenge that was addressed. Involving campus-based students from the Hispanic community definitely aided outreach efforts. The GFHAP is constantly looking for ways to keep the game fowl breeders interested and fulfilling the Program requirements. Particularly successful have been a series of contests and premiums for individuals who are the first to complete a required Program component. Those individuals are recognized with a special logo cap, their photograph in the GFHAP Newsletter, etc. While the premiums require a small monetary investment, they have resulted in increased participation from members of this very competitive clientele group. Extensionists deal not just with commodities, but with clients. CE has a strong tradition of effectively dealing with commodity issues. As CE moves forward, extensionists must find new ways to attract volunteers and under-served clients. Most importantly, once recruited, these individuals must be retained.

MASTER 4-H POULTRY VOLUNTEERS

4-H Program Staff in Ventura County decided Master 4-H Volunteers were needed. The idea came from an Extension Master Volunteer Program in Texas (Texas 4-H and Youth Development Program, 2007). Texas A&M had published materials indicating the availability of training opportunities for adult volunteers in a number of areas. These areas included Beef, Sheep, Swine, Naturalist, and Poultry. In conjunction with the Ventura County staff, it was

decided that Master 4-H Poultry Training be offered in that county, but also open up the program to leaders from a multi-county area in Southern California.

GAME FOWL HEALTH ASSURANCE PROGRAM

In order to become certified in the GFHAP, breeders must complete a series of steps. These include attending 3 educational sessions, culturing their birds, making bird submissions to the California Animal Health and Food Safety (CAHFS) Laboratory, and vaccinating their birds against Newcastle Disease. After the first year of certification, breeders become recertified by completing the same steps as year one, the only exception being that one continuing education course substitutes for the initial three educational sessions.

MATERIALS AND METHODS

Master 4-H Poultry Volunteers

During the summer of 2007, a Master Volunteer curriculum was developed. Certain basic topics (e.g., poultry project selection and starting the project) formed the initial part of the curriculum. Sections were included on specialized topics such as reproduction, incubation, brooding, digestion, nutrition, and health maintenance. A syllabus was produced with companion materials on the above topics plus reference sections on poultry shows, poultry showmanship, and fairs and expositions. A personal library was developed for each Master Volunteer. The library included texts on everything from standard bred poultry to poultry nutrition.

The 4-H YD staff in Ventura County advertised the program through direct mailings to 4-H families in greater southern California. There were several new leaders in the region who had been particularly enthusiastic about becoming better informed and they were individually recruited. A main design principle was that Master Volunteers would receive individualized training. To achieve that, a cap of 12 Volunteers was placed on the course. Early September training dates were selected. This was after the majority of county and state fairs and parallel with the start of the 4-H year. Training time was to run from Friday evening through Saturday afternoon. An evaluation form was also developed.

Game Fowl Health Assurance Program

As GFHAP participants completed Program components, they started calling our offices at University of California Davis (UCD) to see if they had been the first to finish the required step. Obviously in this competitive group of individuals, being first or among the first was very important. It was decided that this competitive spirit could be utilized in our outreach efforts.

A variety of premiums were offered. Everyone completing the mandatory components in year one, received a large laminated biosecurity sign. For the first individuals who showed extra effort, such as setting up a foot bath, we awarded game fowl caps. Other awards included laminated vaccination guidelines, game fowl key chains, etc. (Bradley and McCrea, 2008).

When staffing booths at game fowl events or when doing any type of recruitment, attempts were made to have at least one bi-lingual staff member. Specifically, program coordinators tried to have a Hispanic veterinarian and/or staff member present for all activities.

RESULTS

Master 4-H Poultry Volunteers

The registration for the initial training was very positive. Eleven individuals from four southern California counties attended the training. The very full two day program was conducted in large part by the poultry specialist, with additional presentations by the Ventura County 4-H YD Program Supervisor and by a poultry veterinarian. Volunteers learned of their responsibilities with respect to continuing education and the volunteer hours expected of them in the coming year.

A certificate of completion was the official symbol that each individual had completed the training. However, the large plastic carrier filled with a new personal library was the tool box each was to use as a Master Volunteer (Bradley, 2008).

From the program evaluation forms, it was clear that the volunteers' expectations had been met. While there were both shared and unique expectations, one volunteer's response summed up the group's feelings very well. She wrote, "we hoped to learn enough not to feel like the blind leading the blind" (Rice, 2007).

Since the initial training, volunteers have received regular (usually every two weeks) mailings from the poultry specialist. These are often updates on the global spread of Highly Pathogenic Avian Influenza, information about special programs, listings of new reference material, etc. Communication has gone in the opposite direction, too, as many of the volunteers call the poultry specialist on a routine basis.

Volunteers have used their training and resources in different ways. The three Master Volunteers in one county managed to organize and hold a Super Field Day (Multi-County Invitational), a 4-H Only Fur and Feather Show (Statewide Invitational), succeeded in getting a 4-H Poultry Showmanship division in the regional open poultry show, 4-H divisions in the county fair's small animal division showmanship, small market animals admitted to the county fair's silent auction, promoted members traveling to UCD for the statewide Avian Science Day and obtained partial reimbursement from county 4-H for their travel. All these activities were accomplished in an 8 month period (Trockey, 2008).

Four of the Master Volunteers were actually the two husband and wife teams trained. Following their training, they started a county-wide Master Poultry Project. Their project members planned and executed a Poultry Skillathon at the county-wide Youth Expo. The Master Volunteers also organized a poultry show and showmanship contest at the county field day, obtained county funds for an electronic buzzer system to be used in Avian Bowl competitions, worked with their county fair staff to improve the Junior Poultry Show, and obtained regular publicity for the poultry projects in the county's 4-H newsletter (Rice, 2008).

One Master Volunteer, in the same county as the two couples mentioned above, used her training in a very different way. Since the two couples took the leadership with the 4-H programs, she decided to do outreach to her neighbors. While she lives in a very urban coastal community, she reports that "poultry seem to be the pet of choice these days." She and her son introduced themselves to neighbors by handing out poultry biosecurity calendars produced by the California Department of Food and Agriculture (CDFA) and talking about raising chickens in an appropriate manner. She reported that as the community learned that her family had poultry, she became the local source of chicken advice. She is currently planning a County Beginning 4-H Poultry Project for the next 4-H year. She states her idea in the following way, "It seems to me that it is easier to start out right, than to fix the poultry runs and implement safe practices etc. after a project is under way" (Linderman, 2008).

4-H YD staff members in the various participating counties have made positive comments about the program. Overall the individuals who elected to take the Master Volunteer training were already committed leaders. From interviews with the respective county staff members, it seems that the greatest changes post-training were seen in the newest leaders. Due to their relatively short tenure as leaders, they had the least experience and the fewest resources prior to the training. In general, 4-H YD staff members felt that in addition to the lectures and personal library, the training gave the Master Volunteers confidence and the security that they knew the Specialist and could always call for help. The Ventura County 4-H YD Program Supervisor noted several significant changes in her leaders who completed the training. She said they now work more cooperatively and involve their Master Volunteer counterparts in neighboring counties. She has been very pleased that when she forwards a request from a new poultry leader to the Master Volunteer Leaders, they respond immediately (Gloeckler, 2008). The poultry specialist had been encouraged by increase in communication from leaders in the southern part of the state and the fact that they and their members are now traveling to and participating in events outside of their region.

While Texas has advertised Master 4-H Volunteer Training in Poultry, they have yet to launch the poultry portion of their program (Farnell, 2008). The University of Arkansas tried Master 4-H Poultry Volunteer training some 7-8 years ago, but have not done it since (Wooley, 2008). It seems that Master 4-H Poultry Volunteer Training is still in the experimental stages. The recent California experience suggests that the concept may be especially practical in geographically large states with few poultry extensionists.

Game Fowl Health Assurance Program

Of all the incentives we offered, the biosecurity signs were viewed as the most desirable. It was the carrot of the biosecurity sign that got the slower individuals to complete the program. The laminated vaccination charts were developed based on repeated inquiries from breeders. These, too, were popular items with participants.

During the first years of the program both the CDFA and the UCD had bi-lingual Hispanic poultry veterinarians. These individuals were incredibly valuable both for their ability to present materials in two languages and also as individuals who could engage Hispanic game fowl breeders who were unfamiliar with the other GFHAP staff. When both CDFA and UCD lost their Hispanic poultry veterinarians, a Hispanic Avian Sciences student was recruited to help with outreach. She, too, has been a great asset.

Program participants were encouraged to send in pictures of their biosecurity efforts. In turn the responding breeders had their submitted photos published in the GFHAP Newsletter. Input from participants was continually solicited. When a participant came up with a clever way of handling a management/biosecurity issue, the participant was credited with the idea and it was passed on to others.

Every attempt was made to show the value of GFHAP not only to the health of all the state's birds, but also to the individual breeder. Results obtained from the CAHFS laboratory submissions were reviewed, summarized and presented in the following year's continuing education sessions. Therefore, the individual Program participant not only received a timely report on his/her particular submission, but subsequently was able to learn if other breeders were experiencing similar or different flock health issues. In the continuing education sessions, the Program's veterinarian addressed prevention of the most common issues.

SUMMARY

The 4-H Master Poultry Volunteer Program has created strong bonds between an active number of Master Volunteers and the UCD poultry specialist. The two parties are separated by great distances, but now communicate regularly by phone and mail. While all Master Volunteers report benefits, the newer volunteers have shown the greater jump in activity following training. In addition, cross county cooperation has significantly increased. The Program is supporting leader education (and, therefore, member learning) and should assist in continued productivity from and retention of these 4-H Master Poultry Volunteers.

Providing services with tangible benefits (necropsies, diagnostic reports, vaccine program recommendations, nutritional and management advice) has helped draw breeders to the GFHAP. The ability to include bi-lingual veterinarians and students in Program outreach and delivery has helped recruit reluctant individuals. Individual recognition of members and the ability to offer small incentives has also aided with Program compliance. California's game fowl breeders are much better informed of resources available to them and are participating in meaningful biosecurity and surveillance efforts.

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PANEL: EXTENSION IN THE PAST, PRESENT, AND FUTURE

PRODUCTION

Greg Martin

Pennsylvania State University Cooperative Extension

Since the Hatch Act of 1887, the role of cooperative extension has been to bridge the educational gap between discoveries at experiment stations and university laboratories with industry that may be far removed from such places by distance or time. In essence, the role of extension was and still is based on "service" to the industry who is one of many stakeholders in the land-grant university system. By many methods of delivery, educational programs have been delivered to help bolster the field knowledge base of industry, and to assist in and partner with industry in new discoveries to solve issues facing it.

In its beginnings, the goal of extension was to help boost poultry utilization, production and consumption. Breeds and strains of birds were tested, with the utilization of random sample tests the best genetic pairings could be compared for the region that they were grown. At the same time efficiencies in feed conversion, livability, and productivity were utilized by a growing industry beginning in earnest just prior to World War I. With the development of industrialization, new buildings were designed and management systems were developed to handle more birds with fewer farm workers. Of note were sloping wire housing and the use of slats to encourage floor birds to take to nests and reduce dirty eggs. On farm demonstration sites allowed farmers to field test these new designs that included flooring and egg collection systems that helped automate production. Field extension agents and specialists assisted in reaching farms that may not have been electrified or reached by phone.

With discoveries in the areas of physiology, nutrition, genetics, medicine, food safety, welfare and engineering, extension helped train and advise the industry as the demand for meat and eggs grew during key demand years. With many farm workers taking to factories and deployment during World War II, many farms were scaling up and consolidating efforts in processing and distribution in the formation of co-ops and integrated farms. There were some adjustments that industry had to bear as well, since with the development of light stimulation for layers egg production in earnest became a year-round proposition with fewer birds necessary to produce the same eggs.

As input costs began to rise, examination of the industry in a systems approach was necessary to determine least cost measures, and a means to profitability in shrinking market margins was achieved with help from key extension advisors reviewing the marketplace. By working on a hierarchy of costs that make up the price of production, producers were able to concentrate management focus on areas that would garner the greatest return on effort.

In its current role, extension is working as an information source for industry and is partnering with industry in continual field experimentation of methods of management to solve key issues facing the industry. Environmental controls, production methods for expanding poultry market segments, disease controls, and nutrient management will continue to be at the forefront in many plans of work for extension educators. At the same time, new avenues of extension work

is involving the relationships between the farming community and local and state governance. As a knowledge base, extension plays a role in telling the story of how food is produced.

The tools being used by extension agents in the field is evolving as well, as the industry moves through the 21st century. For the most part newsletters, pamphlets, news articles field days and small meetings are still the main vehicles for information dissemination to the public. The internet is playing a larger role in the exchange of information and ideas. Many extension programs are now using the internet as a distribution for flyers and other extension publications that were normally handled by mail. As time goes on blogs, video conferencing, podcasting, wikis and other methods of delivery may be seen as a bridge between the campus and the field location.

The partnership of the extension educator to the husbandryman in the field has been a long one. The only way to sustain poultry extension into the future is to remain relevant to the needs of our extension stakeholders. This means that extensionists will need to remain flexible to help answer the next "challenge" facing the industry. Industry needs to be a vocal partner and advocate for extension if it is to survive into the future. It may also involve explaining to other sectors of the stakeholder base (extension customers) how our food is produced. As new tools for extension educators evolve, we as our forefathers did, need to be early adopters to help stay current for inquiring minds in a hungry world, and an industry that is willing to meet that demand.

PANEL: EXTENSION IN THE PAST, PRESENT, AND FUTURE

PROCESSING

Pat Curtis
Auburn University

In 1776 George Washington suggested to Congress the formation of the National Board of Agriculture. It was 1819 before New York formed the first State Board of Agriculture. By 1820, agriculture began to demand a place in government and the United States (US) House of Representatives formed the first Agriculture Committee. The US Senate did not form its first agricultural Committee until 1825. In 1839, the Agriculture Department of the U.S. Patent Office was established to collect statistics, distribute seeds and plants and compile and distribute information.

According to the National Broiler Council, in the 1800s and early 1900s, poultry production consisted of many households having backyard flocks of dual-purpose chickens. These chickens supplied eggs and an occasional chicken for Sunday or holiday dinner.

In 1862, when President Abraham Lincoln founded the United States Department of Agriculture (USDA), he called it the "people's department." In Lincoln's day, 48 percent of the population was farmers who needed good seeds and information to grow their crops. Many government agencies began as part of USDA: the Food and Drug Administration (FDA), the Environmental Protection Agency (EPA), the Biological Survey of the Department of Interior, the Forest Service, and the Soil Conservation Service. President Lincoln also appointed a chemist, Charles Wetherill, to lead the Bureau of Chemistry which was a predecessor of the FDA.

The expanding railroads in the late 1800s provided transportation for livestock to markets where they were slaughtered. In 1865, USDA Secretary Isaac Newton urged Congress to enact legislation which would provide quarantining of imported animals. The Act was passed and jurisdiction was given to the Treasury Department, but little action was taken and imported animals continued to bring in disease. Individual States tried to control and eradicate livestock diseases, but their efforts were ineffective.

In the 1870s, refrigerated railcars were introduced and later the development of electricity allowed meat processing to become a year around business. In 1884, President Chester Arthur signed the Act establishing the Bureau of Animal Industry (BAI) which was a predecessor of the Food Safety and Inspection Service (FSIS). The initial Act for the BAI was \$150,000 and a limitation of 20 employees. In August of 1884, the quarantine stations of the Treasury Department were transferred to BAI. The export of U.S. livestock and animal products came under increasingly more stringent restrictions by foreign countries. The livestock producers then begin to urge the government to implement an inspection program that would enable them to compete in foreign trade markets. On August 30, 1890, the initial Meat Inspection Act was approved for salted pork and bacon that was intended for export. In 1891, the Act was amended to cover the inspection and certification of all live cattle and meat for export.

Toward the turn of the century, the use of potentially harmful adulterants in food increased considerably. The use harmful additives came under considerable scrutiny in 1902 when the chief chemist of the Bureau of Chemistry, Harvey Wiley, began to study their effects on humans. Twelve young men volunteered to be "guinea pigs" in testing the effects of additives that Dr. Wiley believed to be dangerous. The men were fed a natural diet and one of the additives being tested. The 12 men became known as the "poison squad." In response to the heightened public awareness, and the findings of the "poison squad" the Pure Food and Drug Act was passed in 1906.

Upton Sinclair published *The Jungle* in 1906 as a motivation to adopt socialism in the U.S. However, it actually became known for its criticisms of the meat industry, and fueled the uproar that led to passage of the Federal Meat Inspection Act (FMIA). Poultry was not included in that FMIA. The Food and Drug Act was also passed at the same time as the FMIA. The USDA's Bureau of Chemistry was assigned the task of enforcing the 1906 Food and Drug Act and the administration of the 1906 Meat Inspection Act was assigned to the Inspection Division of the BAI. The BAI's meat inspection responsibilities grew tremendously as many federal agencies (Navy, Bureau of Indian Affairs, Army, Marine Corps and Veterans Bureau) requested BAI's inspection. Starting in 1912, BAI also inspected eggs for the Navy, long before USDA inspected them for the public.

In 1927, USDA's Bureau of Chemistry which enforced the 1906 Food and Drug Act was reorganized and it became the Food, Drug and Insecticide Administration. It was later renamed the FDA in 1931. In 1940, the FDA was transferred from USDA to the Federal Security Agency, which became in 1953, the Department of Health, Education and Welfare and now the Department of Health and Human Services.

By the 1930s, chicken meat production, previously a subsidiary of the egg industry, began with the development of the broiler. In the 1940s, feed mills, hatcheries, farms, and processors were all separate entities. Eventually entrepreneurs consolidated feed mill, hatchery and processing operations, resulting in the beginnings of the integrated industry. Chickens were typically sold "New York dressed," with only the blood and feathers removed. In 1942, the government approved "on-line" evisceration.

By 1952, specially bred meat chickens surpassed farm chickens as the number one source of chicken meat in the U.S. "Vertical integration" took hold, with a single company involved in every stage of production, processing and marketing.

In 1953, the Eisenhower Administration inaugurated sweeping organizational changes at USDA. The Scientific bureaus, including BAI and the Bureau of Dairy Industry were abolished and their functions transferred to the newly established Agricultural Research Service (ARS).

Following World War II, there was explosive growth in the poultry industry. In 1957, Congress passed the Poultry Products Inspection Act (PPIA) in response to the rapidly expanding market for dressed, ready-to-cook poultry and processed poultry products. During the 1950s and 1960s, inspection increasingly focused on wholesomeness and visible contamination. The prevalence of animal disease as a food safety hazard was decreasing. However, there was an increase in the kinds of products, the complexity of operations and the volume of processed products produced resulting in increased concerns about mislabeling and economic adulteration. In 1958, in response to the public's concern about invisible hazards from

chemicals added directly or indirectly to foods, the Federal Food, Drug and Cosmetic Act of 1906 was amended with the 1958 Food Additive Amendment to deal with the safety of ingredients when used in processed foods, including animal drug residues in meat and poultry products. Due to an inspection system that had become increasingly complicated as the marketing system changed, the FMIA was amended as the Wholesome Meat Act of 1967 and the PPIA was amended to the Poultry Products Inspection Act of 1968. At this point the meat and poultry inspection programs were merged into one program within the Consumer and Marketing Service of USDA's ARS.

By the 1960s, the commercial broiler industry began its economic boom. In the late 1960s and early 1970s, major companies begin to market chickens under brand names. By the mid-1970s, the industry had evolved into its modern state with mechanization technologies. On October 26, 1971 the Animal and Plant Health Service was created to administer all regulatory functions of ARS. In 1972, meat and poultry inspection was transferred from the Consumer Marketing Service to the Animal and Plant Health Inspection Service (APHIS), formally the Animal and Plant Health Service. In 1977, the Food Safety and Quality Service was established and was assigned the responsibility of meat and poultry inspection. In 1981, the Food Safety and Quality Service was redesignated as FSIS.

FSIS enforces the PPIA and the Egg Products Inspection Act. These laws require federal inspection and regulation of poultry and processed egg products prepared and distributed for human consumption. FSIS also verifies compliance with the Humane Methods of Slaughter Act for livestock. Slaughter facilities cannot operate if FSIS inspection is not present. FSIS inspection personnel conduct a carcass-by-carcass inspection which verifies that establishments follow all food safety and humane handling regulations. Only federally inspected plants can produce products that are destined for interstate commerce or for export to foreign countries.

By the early 1980s, consumers preferred cut-up and further-processed chickens to the traditional whole bird. Chicken surpassed pork consumption in 1985. In the U.S., chicken consumption surpassed beef consumption in 1992. By 1996, farm families made up less than 10 percent of rural populations. New records were set in 1996 when the net farm income exceeded \$51 billion and agricultural exports reached \$59.8 billion.

By the mid-1990s, both agency officials and constituents called for a more "science based" inspection system as FSIS was still depending on organoleptic inspection. On July 25, 1996, FSIS issued the Pathogen Reduction/Hazard Analysis and Critical Control Point (HACCP) Systems rule. By 1998, USDA required the HACCP process control system program in all large poultry slaughter establishments. The HACCP regulation totally changed the way chicken was inspected. No longer did the inspectors tell the plant how they needed to accomplish something, now the plants must decide the best way to produce a safe product and be able to prove scientifically that their process is valid. Government is responsible for setting appropriate food safety standards, maintaining a vigorous inspection oversight to ensure those standards are met, and maintaining a strong enforcement program to deal with plants that do not regularly meet the standards.

FSIS employs about 7,800 in-plant inspection personnel who inspect more than 6,200 federally inspected establishments. These establishments vary greatly in size and type of activity conducted. Some of the inspection personnel remain online conducting organoleptic inspection while others conduct HACCP related inspection activities.

Every indication is that FSIS will continue to set performance standards, and remove more of the prescriptive regulations. This means more and more of the food safety decisions will be left to the establishments. In the past couple of years, we have seen significant changes in processing operations. Some processing plants have gone to an extended clean-up program that allows for less frequent pre-operation sanitation inspections. With the recent drought conditions, many plants have implemented water conservation and/or water recycling programs. HACCP regulations have led many plants to change out their evisceration equipment for equipment that provides less opportunity for cross contamination. Other operations have enhanced bird washing systems and/or added an antimicrobial to reduce Salmonella contamination. Many processing plants keep records of Salmonella contamination levels on incoming birds from specific farms, and process birds from higher contaminated farms last.

Technologies continue to be developed to reduce food safety hazards and reduce waste from the process. As new performance standards are set, other new approaches to meet those standards will be devised.

Potential new regulations to look for in the future are:

1. Additional performance standards associated with the control of *Listeria monocytogenes* in ready-to-eat meat and poultry products,
2. HACCP based egg products inspection regulations,
3. Public health-based poultry slaughter inspection, and
4. Nutritional labeling of single-ingredient products and ground or chopped meat and poultry products.

The role of the Extension specialist working with the poultry industry has had to change, and will need to continue to change to meet the changing needs of the industry. Extension and outreach personnel working with the poultry processing industry today must spend more and more time keeping up with and anticipating regulations and the scientific knowledge base. They have to think creatively to help plants apply science based information in a commercial establishment. Much time is spent working one on one with individual plants. However, in order to find the time to work one on one they need to use today's technology when possible to deliver training programs to a global audience.

Information for this paper was taken from:

USDA's Food Safety & Inspection Service Website: <http://www.fsis.usda.gov>

National Chicken Council website: <http://www.nationalchickencouncil.org/>

PANEL: EXTENSION IN THE PAST, PRESENT, AND FUTURE
HEALTH/FOOD SECURITY

Billy Hargis
University of Arkansas

An abstract was not submitted. See the power point for comments.

APPENDIX A

SPEAKER PROGRAM

2008 PSA EXTENSION SYMPOSIUM

THEME: Extension Service: Past, Present, and Future

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Welcome and Washington Update

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Role of Society Presidents in Addressing Bio-ethical Issues: What are the Constraints to Leadership?

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Panel: Future Expectations of Extension

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2008 Farm Bill: Research title VII and its Impact on Federal Ag Research

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Discussion

Panel: Extension in the Past, Present, and Future

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Discussion

General Discussion led by Moderator

APPENDIX B

2008 POWER POINT PRESENTATIONS

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Welcome and Washington Update

Richard Reynnells
USDA/CSREES/PAS

WASHINGTON UPDATE

2008 Poultry Science Association Annual Meeting

Richard Reynnells

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Historical Facts

National Poultry

Extension Workshop

Personnel and Minimum Years of Organizing Committee Assistance

Over 70 Volunteers listed as having participated

Many people provided unofficial assistance to the committee, and many persons listed served more years than shown. For example, Lew Carr helped most years but did not officially join the committee.

Shows the excellent collaboration of Extension personnel

The idea for this meeting originated with Don Bell

Personnel and Minimum Years of Assistance 1

<u>Person</u>	<u>PSA Annual Meeting</u>
Stewart Ackerman	88, 89
Al Adams	91, 92
Dick Adams	95, 96
Ken Anderson	95, 96
Hart Bailey	03, 04
Robert Bastian	90, 91
Don Bell	88, 89
Scott Beyer	99, 00, 02, 03
Sarah Birkhold	95, 96, 00, 01

Personnel and Minimum Years of Assistance 2

<u>Person</u>	<u>PSA Annual Meeting</u>
John Blake	03, 04
Matthew Burnham	04, 05
John Carey	93, 94, 00, 01
Glenn Carpenter	01, 02
Lee Cartwright	04, 05
Phil Clauer	99, 00
Craig Coufel	07, 08, 09
Pat Curtis	93, 94, 08

Personnel and Minimum Years of Assistance 3

<u>Person</u>	<u>PSA Annual Meeting</u>
Mike Darre	91, 92
June de Graft-Hanson	02, 03
Mahmoud El Begearmi	90, 91, 93, 94
Ralph Ernst	93, 94, 00, 01
Brian Fairchild	03, 04
Morgan Farnell	06, 07, 08, 09
Chris Fritts	06, 07

Personnel and Minimum Years of Assistance 4

<u>Person</u>	<u>PSA Annual Meeting</u>
Jesse Grimes	91, 92
Jim Hermes	90, 91, 01, 02
Joe Hess	95, 96, 06, 07
Mike Hulet	97, 98
Jacque Jacob	01, 02, 05, 06, 07, 08
Wes Jamison	97, 98
Frank Jones	92, 93
Herb Jordan	92, 93

Personnel and Minimum Years of Assistance 5

<u>Person</u>	<u>PSA Annual Meeting</u>
Ken Koelkebeck	89, 90
Doug Kuney	05, 06
Barry Lott	02, 03
Theresa LaVergne	04, 05, 06, 07
Ken Maciorowski	02, 03, 06, 07
Ken Macklin	07, 08
Greg Martin	07, 08
Brigid McCrea	08

Personnel and Minimum Years of Assistance 6

<u>Person</u>	<u>PSA Annual Meeting</u>
Audrey McElroy	01, 02, 06, 07
Bill McKeen	93, 94
Teresa Morishita	96, 97
Dennis Murphy	95, 96
Sally Noll	97, 98, 06, 07
Curtis Novak	02, 03, 05, 06, 07, 08
Mike Quart	95, 96

Personnel and Minimum Years of Assistance 7

<u>Person</u>	<u>PSA Annual Meeting</u>
Dan Palmer	93, 94
Kris Park	90, 91
Tony Pescatore	99, 00
Allan Rahn	88
Richard Reynnells	88, ...08
Jim Rock	92, 93...08
Casey Ritz	97, 98, 01, 02, 06, 07
Kevin Roberson	04, 05

Personnel and Minimum Years of Assistance 8

<u>Person</u>	<u>PSA Annual Meeting</u>
Shiela Scheidler	89, 90
Peter Skewes	89, 90
Diane Spratt	99, 00, 02, 03
Victor Stanley	01, 02
Ralph Stonerock	03, 04
Jennifer Timmons	08
Larry Vest	88, 89
John Voris	89, 90

Personnel and Minimum Years of Assistance 9

<u>Person</u>	<u>PSA Annual Meeting</u>
Chuck Wabeck	88, 89, 95, 96
Lynette Ward	02, 03
Susan Watkins	99, 00, 06, 07
Bruce Webster	97, 98
Jeanna Wilson	97, 98
Mike Wineland	08
Patricia White	97, 98

Personnel and Minimum Years of Assistance 10

<u>Person</u>	<u>PSA Annual Meeting</u>
Nick Zimmermann	97, 98

Persons listed as '08 are also on the '09 committee.

Jim Rock (retired, CT) Permanent Evaluation Czar, 1992 ...present

Starting in 2004, the Poultry Science Association incorporated the National Poultry Extension Workshop into the official PSA program.

Now the organizing committee includes the PSA Extension Committee and Volunteers.

Including volunteers was an important part of this workshop from the beginning.

Volunteer involvement is important for several reasons:

- e.g., inclusiveness (minimize cliques; "good-old boy/girl system; etc.)
- give younger and other members a chance to be involved and network (rather than held back until they are approved by some authority);
- people want to help so they are actively involved; etc.

Volunteer Chairpersons

<u>Person</u>	<u>PSA Annual Meeting</u>
Richard Reynnells	88 – 90, 00**, 01*, 04*, 07*
Kris Park	91
Jesse Grimes	92
John Carey	93
Dan Palmer	94

** combined with nutrition workshop, PSA with WPSA

* combined meetings with ASAS, ADSA, PSA

Volunteer Chairpersons

<u>Person</u>	<u>PSA Annual Meeting</u>
Sarah Birkhold	95
Joe Hess	96
Teresa Morishita	97
Bruce Webster	98
Scott Beyer	99
Diane Spratt	02

Volunteer Chairpersons

<u>Person</u>	<u>PSA Annual Meeting</u>
June de Graft-Hanson	03
Curtis Novak	05
Audrey McElroy	06
Jennifer Timmons	08

Through about 2003 the Chairperson was selected by drawing the name of one of several volunteers from a bowl by Russ or Sam Reynnells

Special Recognition Award (Golden Cup Award)

Based on similar award by Basil Eastwood for ADSA Extension members.

Provided by Richard Reynnells simply because it is a good idea, and people should know their efforts are appreciated.

Special Recognition Award (Golden Cup Award)

The award is apolitical, the decision is often spontaneous and based on whim, with full realization that many people are very deserving.

This is a very small recognition and token of appreciation for sustained and valuable work in Extension, that generally goes unrecognized or is underappreciated.

Special Recognition Award (Golden Cup Award)

<u>Person</u>	<u>PSA Annual Meeting</u>
Jim Rock	97
Paul Ruzler	98
Nick Zimmermann	99
John Blake	00
Ralph Ernst	01
Glenn Carpenter	02

Special Recognition Award (Golden Cup Award)

<u>Person</u>	<u>PSA Annual Meeting</u>
June de Graft-Hanson	03
Mike Hulet	04
Paul Patterson	05
Theresia LaVergne	06
Casey Ritz	07
Jesse & Doris Lyons	08

Washington Update

Thank Muquarrab Qureshi !!

We have broken with tradition and moved the workshop to Monday a.m.

If you like Not having to meet on Sunday a.m.,
be certain to tell a Board of Director
member!!

Muquarrab has proven that the workshop
can be accommodated on Monday and non-
competitive abstracts scheduled against it

PERSONNEL

No new NPL's

Muquarrab Qureshi promoted to Director of
Animal Systems, PAS, CSREES

Special Recognition Award

The annual Poultry Extension Special
Recognition (a.k.a. Golden Cup) Award
Jesse and Doris Lyons, University of Missouri

JOB RESPONSIBILITIES

Very little change.

But more paper pushing. Less emphasis on
program development and interaction with multi-
state research committees, etc. due to priorities as
limited by budget levels (e.g., travel funds).

As you, NPL's are being asked to do more with less
money (actual and adjusted for inflation) and time.

*Where is the point of diminishing returns and
burnout? **Keep personal priorities correct.***

National Institute for Food and Agriculture (NIFA)

Not much information from CSREES (only
agency to create NIFA)

No real changes except, Administrator position

CSREES programs, authorities: reauthorized
Add a few responsibilities

National Institute for Food and Agriculture (NIFA)

Elevate role of CSREES in USDA

CSREES becomes NIFA with elevated stature
and visibility in the Department

NIFA Director to be esteemed scientist and
appointed by the President; six year term

Monitor <https://www.nasulgc.org> for updates

Department Reviews

An important part of the job, and are assigned through the CSREES system.

The scheduling of reviews has become flexible so they are accepted for assignment throughout the year.

Multi-State Research Committees

USDA/CSREES Primary Liaison

- | | |
|---------|--|
| NC-1029 | Applied Animal Behavior and Welfare; |
| S-1027 | The Poultry Food System: A Farm to Table Model; |
| S-1035 | Nutritional and Management Abatement Strategies for Improvement of Poultry Air and Water Quality |

USDA/CSREES Primary Liaison

- | | |
|----------|--|
| NE-1022 | Poultry Production Systems: Optimization of Production and Welfare Using Physiological, Behavioral, and Physical Measurements; |
| NCCC-209 | Agricultural Bioethics; changed regions (from West to NC); official start is October 1; meet October 31 at Michigan State University |

USDA/CSREES Primary Liaison

- | | |
|-----------|---|
| NC-507 | Midwest Poultry Research Project |
| NCERA-089 | Swine Production Management to Enhance Animal Welfare |
| W-503 | Economic, Environmental, Genetic, and Nutritional Aspects of Grass-Fed Beef |

USDA Secondary Liaison

- | | |
|----------|--|
| W-1173 | Stress Factors of Farm Animals and their Effects on Performance; |
| NEAC-2 | Animal Science Advisory Committee; |
| SAC-002 | Animal Sciences; and |
| NCCC-097 | Regulation of Adipose Tissue Accretion in Meat-Producing Animals |

USDA Liaison

National Information Management and Support System (NIMSS)

<http://www.lgu.umd.edu>;

NEW <http://nimss.umd.edu>

Developed by State Agric. Expt. Stations

Facilitate tracking, retrieval, and management of the national portfolio of multi-state research projects

Document Reviews

Review and approve Hatch Act projects submitted by all institutions before funds are released for research project support

Form 417 codes need to match activities in the research description

IACUC section must be dated if use live animals

Evaluate CRIS reports

define percentage involvement of the project in specific areas such as animal welfare.

Plans of Work and Accomplishment Reports

Review/approval of state Plans of Work and Accomplishment Reports: research and extension

CSREES Co-Liaison for NC and SD

Even for well-written reports the review process is very time consuming, as it is for the state personnel who write the reports

The process can be relatively painless **iff** the person submitting the documents will
be thorough, yet
Concise, and
follow directions

NPLs can not approve the reports for processing unless
the reports meet the criteria provided in the directions

IT IS VERY IMPORTANT:

faculty provide solid information to their administrative personnel who prepare the documentation of activities and whenever possible,

the impact (return on tax dollars spent) of investments

There is increasing demand for accountability and these reports are crucial in establishing the value of research and extension programs.

Define economic and/or societal impact

Ask clientele what quantifiable value your programs have for individual companies or farmers, or the poultry system

Use for Accomplishment Reports, Success Stories; other documentation of positive program impacts

As stated previously, the days of just "knowing" we have value are over.

Liaison to State LGU

Starting in 2006

NPLs serve as a Liaison to LGUs

SD (1862, 1994 LGU)

NC (1862, 1890 LGU)

Review, approve POW/AR;

Provide information to LGU administrators;

CSREES programs and functions

Help remove bottlenecks, address problems

Learn LGU needs and report to CSREES

Grant Reviews

- Administer, or panel member, for various grants
- 2007 Federal Administrative Research Grants and Special Research Grants not available; do not know status for 2008

The most common problems include:

- forms are missing
- information on forms is incomplete or incorrect or inconsistent with other portions of the proposal (e.g., budget numbers do not match narrative)

- Some significant problems include:

- replacing quantity for quality of content
- not proof reading the proposal or not even using spell check
- vague references to expected outcomes or procedures to obtain data
- not following directions

Even special earmarked funds, which NPL's are responsible for administering, will not be approved if the proposal is deficient.

USDA and Other Information

- **Grants**
 - The new procedures to follow when applying for grants, and release of grant information from CSREES, with application forms and deadlines, can be found at:
 - www.grants.gov, or
 - <http://www.csrees.usda.gov/fundingopportunities/requestforapplications>

Portfolio Evaluation

CSREES has chosen to review our portfolio of programs to justify our budget requests

Annual Update plus 5-year summary review

Fewer people to create the report, no decrease in other duties

Lead for:

KA306 Environmental Stress in Animals

KA308 Improved Animal Products (Before Harvest)

KA315 Animal Welfare

Assist: Management and Production etc. portfolios

Internal Committees

Diversity Committee

Meetings

US Poultry and Egg Association International Exposition

PSA Extension Committee and PSA Extension Workshop Org. Com.

NE-1022 Poultry Production Systems: Optimization of Production and Welfare Using Physiological, Behavioral and Physical Assessments

National Egg Quality School

National Egg Products School

American Poultry Historical Society

S-1027 The Poultry Food System: A Farm to Table Approach

Quadrennial Extension Poultry Workshop

Extension Layer Test Program

S-1035 Nutritional and Management Abatement Strategies for Improvement of Poultry Air and Water Quality

National Poultry Waste Management Symposium

Tyson Foods PSA Support Personnel Award

2008 Future Trends in Animal Agriculture

- "Food Safety and Animal Welfare: Developing a Complementary Relationship"

Southern Region Poultry Extension Workshop (Quadrennial)

- Ken Anderson, Chair, 2009

National Poultry Waste Management Symposium

- Wanda Linker, Alabama Poultry Association
- It is essential for the success of this meeting to have reliable volunteers to head the different committees and reliable personnel to work on the committees.
- Contact Casey Ritz, University of Georgia for more information or to help on a 2008 committee

PSA National Extension Workshop

- Part of PSA Extension Committee
- Need Volunteers for the organizing Sub-Committees
- Start to prepare the program beginning in September/October
- Speaker Papers for JAPR due in September

Projects

Animal Welfare Judging Contest

The Animal Behavior and Welfare Group (ABWG) at Michigan State University shares leadership with Purdue University the University of Wisconsin

Evaluate live animals and/or CD-based situations of animal management
provide reasoning to judges

Poster Session started, 2007; *abstracts*, 2009

2008 included veterinary student section

2009 will include graduate students

NOVEMBER 1 and 2, 2008 at MSU; see brochure

Diverse Voices in Agriculture

Audience is primarily USDA Personnel

Topics include: gas stunning, high-tech. HACCP
Union of Concerned Scientists; Grass Fed Beef
National Commission on Industrial Farm Animal
Production

CAST: several for presentation of new publications

CIWF

NAIA

The Unwanted Horse Issue: What Now? forum

USDA Informal Animal Welfare Working Group

Audience is only USDA Personnel

Stimulate discussion and provide opportunity to network

Quarterly meetings

"The Unwanted Horse Issue: What Now?" forum created from topic scheduled for this group

Distribution Lists

replaced the newsletter

animal rights/welfare, game birds, food safety, rabbit, and those related to the multi-state research projects

Contact me if you think an additional listing would be beneficial

American Poultry Historical Society

–Hall of Fame Award

Nick Zimmermann,
University of Maryland

PSA 2008 Tyson Foods Support Personnel Award

–Felicity Dennis, University of Alberta

–Nomination package provided by Frank Robinson

QUESTIONS?

Role of Society Presidents in Addressing Bio-ethical Issues: What are the Constraints to Leadership?

Mike Lacy
University of Georgia

Bioethics: The Need for Leadership and How the Societies Should Respond

ADSA, ASAS, PSA Annual
Meetings July, 2008
M. P. Lacy, Poultry Science
Association

Bioethics: Definition



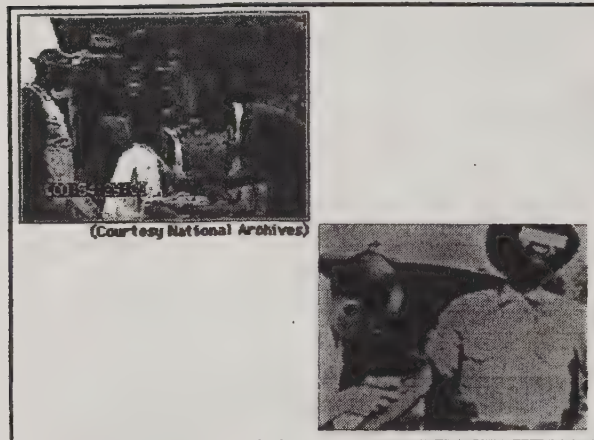
- An interdisciplinary field concerned with issues in the life sciences, health and health care.
- Abortion, designer babies, birth ethics, treatment decisions, gene therapy, experimental treatments, end of life issues.
- Does bioethics apply to food animals?

History of Bioethics



- New discipline of inquiry.
- Nuremburg trials, Tuskegee experiment.
- American discipline.
- Ambivalence toward progress.
- Anti-technological development.
- Responsible science.





History of Bioethics

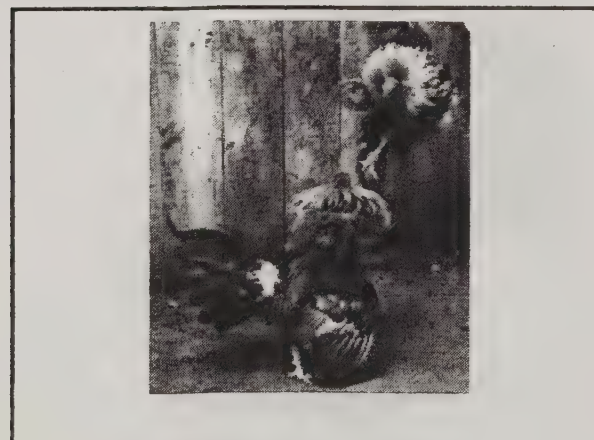


- New discipline of inquiry.
- Nuremberg trials, Tuskegee experiment.
- American discipline.
- Ambivalence toward progress.
- Anti-technological development.
- Responsible science.

Does bioethics apply to food animals?



- Humans = Animals
- Human – animal interaction.
- Broadest definition.
- Animal welfare, environmental impact, food safety (residues)...?
- Unescapable - as responsible scientists, we are engaged in bioethics.



Does bioethics apply to food animals?



- Humans = Animals
- Human – animal interaction.
- Broadest definition.
- Animal welfare, environmental impact, food safety (residues)...?
- Unescapable - as responsible scientists, we are engaged in bioethics.

Role of ADSA, ASAS and PSA

- Honest
- Forward thinking
- Leadership, proactive
- Extend knowledge to students, industry, public



Some reasons for optimism

- We have become more proactive, animal use and care guidelines, environmental progress.
- We are considered philosophers.
- We have something to contribute.
- Our input is important.



- "We can do more good fighting AIDS or malaria in Africa than fussing over consent forms for research studies."

Baron, *Against Bioethics*



Some reasons for concern

- We are seen as biased, part of the industry.
- Science and scientists cannot be trusted.
- Bioethics committees.



The Bigger Picture

- As responsible scientists we are already engaged in bioethics.



PACCO (Professional Animal Auditors Certification Organization, Inc.) Update

Karen Christensen
O.K. Farms, Inc.

An Update on PAACO

Professional Animal Auditor Certification Organization

Karen Christensen
OK Farms, Inc.
PAACO Director



History of PAACO

- Established in 2004
- Founding Organizations and Current Members
 - FASS
 - AABP
 - AASV
 - AAAP
 - ARPAS

Mission Statement - Simplified

- Quality Audits
- Quality Auditing

www.animalauditor.org

Why PAACO?

- Need for professional auditors
- Consistency in auditing practices
- Experience and education
- Valuable information for everyone involved in animal welfare
- Validate audits

Training

- Six beef, swine and sheep Meat Plant sessions
- Two-day sessions plus exam
- Shadow audits and CE
- 120 attendees
- 42 certified auditors

Training

- Two poultry training sessions
- Three days training
- Examination, shadow audits and CE
- 131 attendees
- Sept. 2008 training in Raleigh, NC
- 72 certified auditors

Validation of Audits

- Validus – Dairy Audit
- American Humane Assoc – multiple species audits
- American Meat Institute – Red Meat Slaughter audit

What is next for PAACO?

- Mike Simpson, Executive Director
- Annual meeting to discuss current issues
- Customer and Supplier trend - all auditors to be PAACO certified
- Newsletter

What is next for PAACO?

- Development of a Council – customer to supplier
 - Council would bring together all parties
 - Forum for welfare issues and research
 - Support a single audit that is well accepted

PAACO

- Animal welfare issues for all species will continue to be in the forefront
- PAACO will play a significant role in training quality auditors
- PAACO will facilitate welfare issues throughout the process

Questions?

FAACO



www.animalauditor.org

Panel: Future Expectations of Extension

Student

Lindsay Stevenson
Auburn University

Future expectations of extension: A student's perspective

Lindsay M. Stevenson
Auburn University, Auburn, AL

Today's College Student

- ◆ Students starting college in the fall of 2008 were born in 1990.
- ◆ These students do not remember life with out Nintendo, home computers, and the Internet.

Today's College Student

- ◆ They have had cell phones for years and are always connected.
- ◆ They are masters at multi-tasking and often do several different things at once.

Today's College Student

- ◆ Students are likely to search the Internet for information
- ◆ If it takes more than three clicks to find the information they are looking for on the internet, they will move on.

Traditional Extension

- ◆ Traditional extension programs rely on sending information through the mail and personal phone calls.
- ◆ This approach often takes a long time, but builds strong relationships.

Extension in the Future

- ◆ This traditional approach will not work with the college students of today and the future.
- ◆ Extension must change to become more technologically advanced for this generation.

Extension in the Future

- ◆ For extension to continue to be a valuable resource, it needs to be more prevalent on the Internet.
- ◆ It is important to have up-to-date information and resources for producers and consumers.

Extension in the Future

- ◆ It is also important to have easy to use websites that are user friendly.
- ◆ These websites must have the information easy to find and be available to be searched through Internet search engines.

Extension in the Future

- ◆ If an extension website provides good information in an easy to understand format, producers and consumers will continue to return to that site when they need more information.

Today's Students and Extension

- ◆ Many students do not know who the extension specialists are in their department or what they do.
- ◆ Often, the only contact they have is if they teach a class.

Today's Students and Extension

- ◆ It would be helpful for students to interact more with the extension specialists.
- ◆ A possible way to do this is to have a "shadowing" class for students to learn about extension.

Future expectations of extension: A student's perspective

Lindsay M. Stevenson
Auburn University, Auburn, AL

Panel: Future Expectations of Extension

Industry

Drew Giesen
Novus International, Inc

Drew was unable to participate due to circumstances beyond his control.

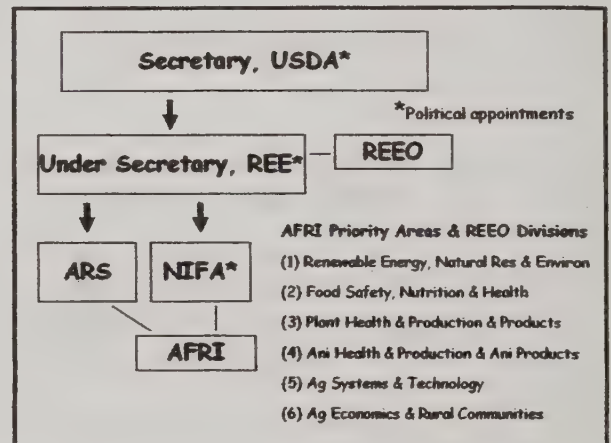
2008 Farm Bill: Research Title VII and its Impact on Federal Ag Research

Murray R. Bakst
USDA/ARS
AAAS Congressional Science Fellow

Poultry Science Association
2008 Annual Meeting

*2008 Farm Bill: Research Title VII and its
Impact on Federal Ag Research*

Murray R. Bakst
AAAS Congressional Science Fellow
(Professional Animal Scientist)



THE FARM BILL - TITLE VII - Research and Related Matters Section 7511 Research, Education, & Economics (REE)

Under Secretary of REE, Chief Scientist of USDA and coordinates all research, education, and extension activities

Establish the Research, Education, and Extension Office (REEO)
within the office of the Under Secretary (limited personnel)

REEO consist of 6 divisions

- (1) Renewable Energy, Natural Resources, & Environment
- (2) Food Safety, Nutrition, & Health
- (3) Plant Health & Production & Plant Products
- (4) Animal Health & Production & Animal Products
- (5) Agricultural Systems & Technology
- (6) Agricultural Economics & Rural Communities

Division Chiefs appointed from within REE, 4 year term, advises Chief Scientist on emerging agricultural REE needs

THE FARM BILL - TITLE VII - Research and Related Matters Section 7511 Research, Education, & Economics National Institute of Food and Agriculture (NIFA) to be established by October 1, 2009

Transfer all authorities from CSREES to NIFA

By restructuring CSREES, managers intend NIFA to raise 'the profile' of agricultural research extension, and education to make NIFA commensurate in stature with other grant-making agencies across the Federal government such as NIH and NSF.

NIFA Director: distinguished scientist appointed by President; 6-year term; establish offices within NIFA.

NIFA only REE Agency with political appointee

CSREES Administrator? (Dr. Colien Hefferan liked on hill)

THE FARM BILL - TITLE VII - Research and Related Matters
Section 7406 Agriculture & Food Research Initiative

AFRI - competitive grants authorization, replacing NRI and IFAFS (Initiative for Future Ag & Food Systems)

- Authorized (not appropriated) \$700 million "Managers (Conference committee members from both chambers) recognize agriculture research is under funded."
- 60% fundamental research & 40% applied to res., ext., ed
- Eligibility: ag. exp. stations; universities; fed. agencies; private sector (who isn't?)
- Priority Areas (next slide)

THE FARM BILL - TITLE VII - Research and Related Matters
Section 7406 Agriculture & Food Research Initiative

AFRI - competitive grants authorization, replacing NRI and IFAFS (Initiative for Future Ag & Food Systems)

- Priority Areas
 - (1) Plant Health & Production & Plant Products
 - (2) Animal Health & Production & Animal Products
 - (3) Food Safety, Nutrition, & Health
 - (4) Renewable Energy, Natural Resources, & Environment
 - (5) Agriculture Systems & Technology
 - (6) Agriculture Economics & Rural Communities

Managers encourage emphasis on funding conventional plant and animal breeding in AFRI.

THE FARM BILL - TITLE VII - Research and Related Matters

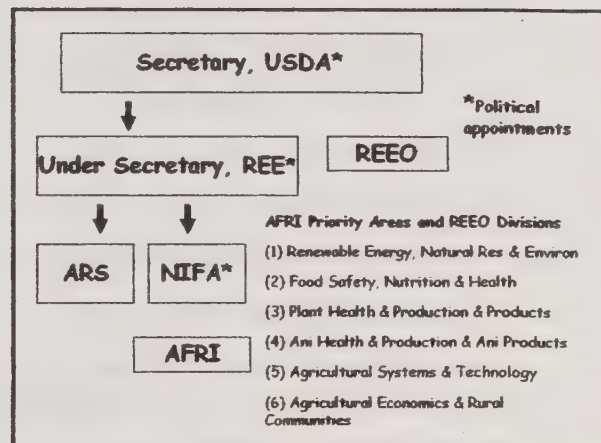
Section 7511 Research, Education, & Economics
 National Institute of Food and Agriculture (NIFA) to be established by October 1, 2009 (psst, what about ARS?)

ARS, unchanged in Farm Bill, its future?

REEO impact on ARS NPS, to be defined

Many members appreciate the role of ARS as the research arm of the USDA

Proposed '09 program cuts in ARS in President's budget???



Who Works for Us* in Congress?

Us = poultry /livestock research and production interests*

1. Section 7311 Specialty Crop Research Initiative -(vegetables, fruits, tree nuts, horticulture) FY08-12, \$80 million, mandatory funding
2. House bill that would enact federal farm animal welfare guidelines
3. Senate briefing on cloning of farm animals and its danger to humans
4. Farm Bill celebration hosted by Ag committees and Nancy Pelosi

What do these have in-common? *No one from FASS!*

Over years who pushed? Who attended the briefings, hearings, celebrations? Who name was known when an ag committee staffer needed information? Whose name will be remembered when that staffer has to authorize \$70m for some project? Whose agenda will be heard?

Thanks to.....

- ☐ FASS, PSA for selection for Fellowship
- ☐ ARS for funding 'sabbatical'
- ☐ You for listening

Questions? Ask here or email:

murray.bakst@mail.house.gov

murray.bakst@ars.usda.gov

Panel: Future Expectations of Extension

Faculty

Tony Pescatore
University of Kentucky

Future expectations of extension

A faculty member's perspective
Anthony J. Pescatore

Extension

**Providing people with the knowledge
and skills to make informed decisions
that impact the quality of their life**

To be successful we need to:
Remember where you have been
Be aware where you are
Question where you need to be

Extension (the good old days)

- The Gatekeeper**
- Social Events**
- Sole Source**
- Little competition**

Remember where you have been
Be aware where you are
Question where you need to be

Knowledge and Information

"The amount of new words, sounds, pictures and numbers produced and stored on paper, film or computer files doubled in the last three years"

"The supply of new material saved in a single year would fill half a million libraries the size of Library of Congress"

Lyman and Varian UC

Knowledge and Information

***EXTENSION IS A RELIABLE
SOURCE OF INFORMATION***

To be "THE" source of information Extension must be:

Rapid and Accessible

Research Based

Above Reproach

Problems Need Solutions

- **Issues are more complicated**
- **Issues are interrelated**
- **No one solution / No one person**
- **Changing environment**
- **Global impacts**

Opportunities for success

- **The "Inters" and the "Multies"**
- **Variety of Program Delivery Methods**
- **Desire to Improve**
- **Advance and Master Programs**
- **Creativity Leads to Resources and Support**

People Are The Greatest Asset

- **Value**
- **Develop**
- **Encourage**
- **Reward**
- **Listen**

Infrastructure needs to be maintained and expanded

- **Communication**
- **Delivery Methods**
- **Critical Mass**
- **Support Personnel**
- **Computer infrastructure**

Accountability

- Society Demands It
- Advocates and Supporters Need It
- Competition for Resources Require It
- Clientele Deserve It

Accountability

We must count the things that can be counted, but just because it can't be counted does not mean it does not count

Challenges of Accountability

- Many things we do are long term
- We change lives
- Need to move to measuring behavioral changes
- Focus groups / Advisory groups
- Live in a sound bite society

Partnerships and Collaborations

Elements needed for success

- It is beneficial for all parties involved
- Credit is shared by all
- It accomplishes a common goal
- It addresses a real need
- All parties are committed

Summary

- Extension will remain "the" source of information
- People are the assets
- The issues and needs have never been greater
- Be accountable
- Partnerships and alternative funding are essential for success
- Infra structure expanded and maintained
- Enjoy your work

Extension

Providing people with the knowledge and skills to make informed decisions that impact the quality of their life

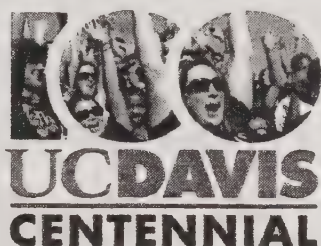
Panel: Extension in the Past, Present, and Future

Youth and Under-Served Audiences

Francine Bradley
University of California, Davis

Youth and Under-served Audiences

Francine A. Bradley
Extension Poultry Specialist

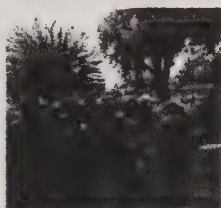


Extension Staffing vs Clientele Needs



Two Client Groups

- 4-H Poultry Leaders
- Game Fowl Breeders



4-H Enrollments

- Youth
- VOLUNTEER LEADERS***

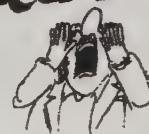
2006-7 4-H Enrollment

Individuals in Clubs – 3490

Additional individuals in Embryology
Projects – ~9,880

Adult Volunteers

Volunteers!



Volunteers! Illustration by [illegible], revised May 28, 2007

Adult Volunteers

- Recruitment
- Retention

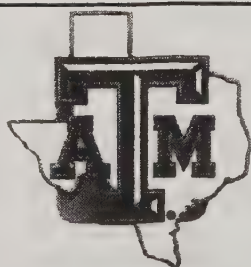
Ventura County's 4-H Program Staff

Need for Master 4-H Volunteers

- Poultry
- Swine



http://www.cooperativeextension.org/ventura/

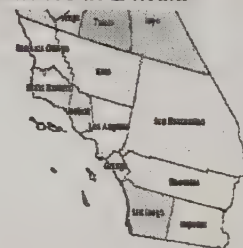


Advertising volunteer opportunities for
Master Training in Poultry, Naturalist,
Sheep, Swine, and Beef

http://www.cooperativeextension.org/ventura/

Master 4-H Poultry Volunteers

- Training offered in Ventura, California
- Open to 4-H Poultry Leaders in a multi-county area



Targeted Counties



4-H Master Poultry Leader Training

Who and Where: This is a wonderful opportunity for beginner leaders to participate in an extensive training program presented by Dr. Patricia Bradley, UC Santa Barbara Avian Specialist. Those attending will be expected to share the knowledge from the training with other leaders in their counties, region, and/or state, helping to provide our 4-H members with the most up-to-date program information possible.

When: Friday, September 7th 6 - 9 p.m.
Saturday, September 8th 8:30 a.m. - 4:30 p.m.

Where: Friday - Ventura County 4-H Club Office
449 Cherry Square Dr. #700
Ventura, CA 93003
Saturday - Hansen Agricultural Center
Griggs Road
Santa Paula, CA

Cost: \$25 per person for meals (Friday night dinner, Saturday morning continental breakfast, & Saturday lunch). Please send check made payable to Ventura Co. 4-H Program to the address above. Please indicate any special dietary needs.

Questions: Contact Susan Schneider, 4-H Program Supervisor, Ventura Co. (805) 645-0943 e-mail: sjschneider@ucsb.edu

Response

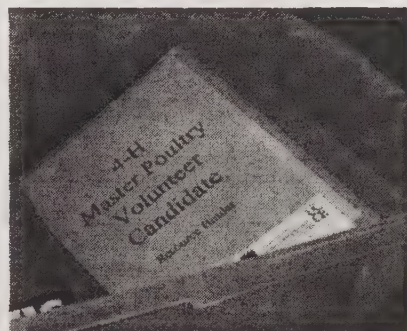
- 11/12 training spots filled
- Good geographic spread
- More young leaders, than veterans

Initial Training

- Two day training
- Presenters



Curriculum



Evaluations

1. My expectations of the training were: I honestly did not have any pre-conceptions about the training. I was just glad to have the opportunity to learn from you. I felt as though I could use it more as a resource to pass on to others, rather than relying on my own knowledge of poultry.
2. My expectations were: not met. I met +++ satisfaction. The training was more than I expected.
3. The most important TOPIC covered was: Poultry marketing. This is a topic that I always just skimmed over, overlooking the fact that it is the project to know it, but not all could learn myself.
4. The most useful ITEM I took home was: the notes I took and the resource books I took in the process of the training.

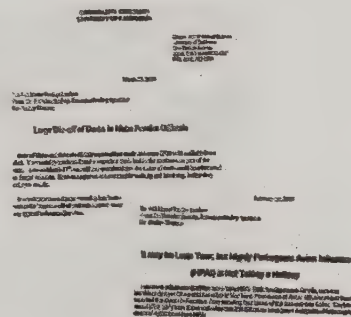
1. My expectations of the training were:
to start the process of obtaining a greater understanding of poultry and the industry. Also, to learn more about the industry and the people involved.
2. My expectations were: not met Y met
3. The most important TOPIC covered was:
feeding

1. My expectations of the training were:
We weren't sure what to expect. It was a new training. We hoped to learn enough not to feel like the blind leading the blind.

Communications

From UC Davis

- Routine mailings
- Phone calls



Communications, cont.

From Master Volunteers

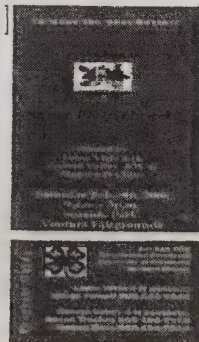
- Requests for assistance
- Invitations



Master Volunteers' Accomplishments

Ventura County's 3 Master Volunteers:

- Super Field Day (multi-county)



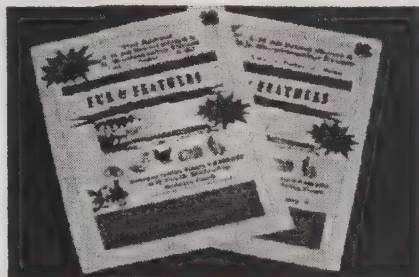
Accomplishments in Ventura County, cont.

Introduced 4-H Poultry Showmanship to regional open poultry show

- Small Animal 4-H Divisions at County Fair
- Small Animals admitted to Fair's Silent Auction
- Promoted 4-Hers to travel to UC Davis for Avian Sciences Day and obtained County funding

Accomplishments in Ventura Co., cont.

- 4-H Only Fur & Feathers Invitational



Accomplishments of the Master Volunteer Couples



- Started county-wide Master Poultry Project

Accomplishments of the Master Volunteer Couples, cont.

- Along with 4-Hers put on a Poultry Skillathon

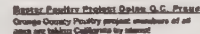
[illegible]

- Organized Poultry Show and Showmanship Contest at county field day
- Secured county funding for Avian Bowl buzzer system

Accomplishments of the Master Volunteer couples, cont.

- Assisted County Fair staff in improving Junior Poultry Show

- Publicized poultry projects in the 4-H Newsletter



Way to go O.C.
Shir Rice, Master Painter Project
 Leader

The newest County Project, Master Plan, addresses many other and important ones.

many records back to Orange County. We played Varsity Small Animal Field Day where Ben J. Shum won second place in showmanship. Cru Malone had a few place bred and by Malena had



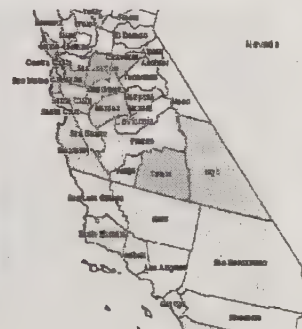
Bryan Sackoff, Lauren Fe-
Tracy & Tins Rino, and Al-
Lindeman all attended
again when in Vazov-
Bryan and Tracy both in
place
their classes, and Lauren placed
and her way to succeed in the exam-
the exterior's bloom did very well
trats. Best Variety, Best of the
area. AUSA.

At the Boulder Colorado Botany Show in Fresno

Feedback from 4-H Staff

- Greatest changes seen in newest leaders who received training
- Felt Master Volunteers gained confidence and sense of security
- Master Volunteers now work more cooperatively
- Master Volunteers are quickly handling calls from backyarders

Fewer barriers...



- **Texas**
 - Poultry portion yet to be launched
- **Arkansas**
 - Training done 7-8 years ago; has not been repeated

- Initial Training
- Recertification



Observations as breeders completed Program components

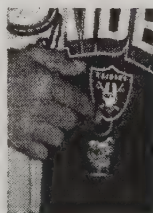
- "Was I the first?"



- **Biosecurity Signs**

- Laminated vaccination guidelines

- **Key chains**

[illegible]

Recruitment

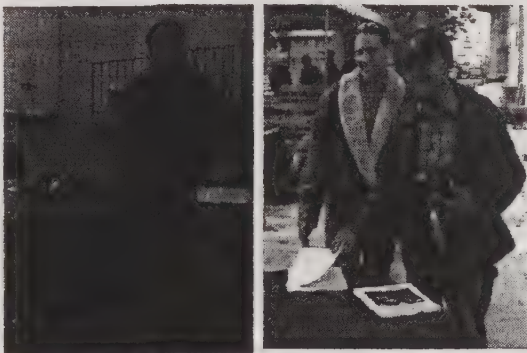
- Staffing at GFHA Booths

Effectiveness of Incentives

- Biosecurity Signs

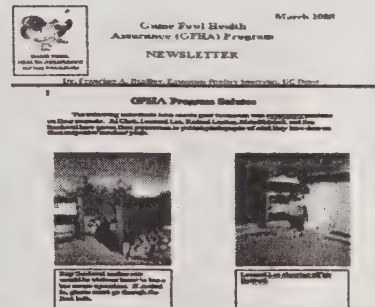


Importance of Diversity in Recruiters



Reinforcements

- Newsletter

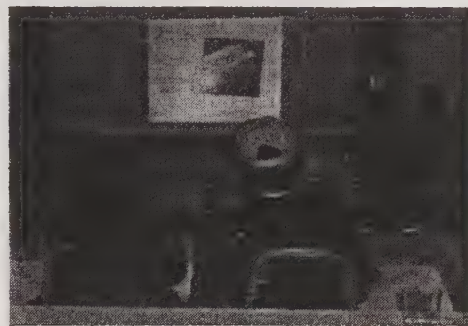


Value to participants

- Information from California Animal Health and Food Safety (CAHFS) Laboratory
 - Individual reports to breeders



Review of previous year's GFHA submissions



Summary

- 4-H Master Poultry Volunteer Program
 - More support for new volunteers
 - Insure they are spreading science-based information
 - Overcome geographical barriers
 - Retention

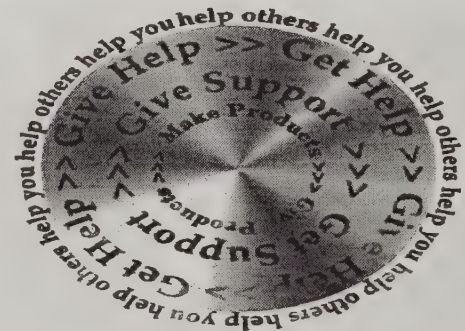
• Game Fowl Breeders

- Services with tangible benefits (necropsies, diagnostic reports, recommendations on vaccination programs, nutrition and management advice)
- Bilingual recruiters
- Small incentives encourage compliance

Cooperative Extension Today



Cooperative Extension and Clients



Panel: Extension in the Past, Present, and Future

Production

Greg Martin
The Pennsylvania State University

Extension in the Past, Present, and Future: Production

Greg Martin



Thanks: R. Eldon, R. Reynolds

Service



The most visible
function of an
University

Production Advances

- +Housing
- Lighting
- Equipment

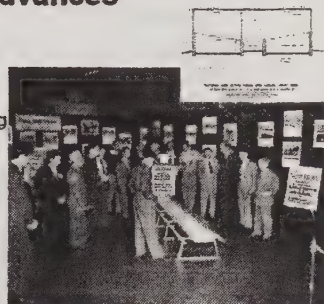
- +Feeds & Nutrition

- +Breed Selection & Growing Programs

- +Health & Immunization

- +Ventilation

- +Business Organization
- Logistics and Analysis



Production Changes

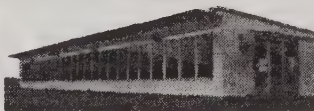


What Does the Future Hold?

4 YEAR SUMMARY OF
Egg Production, Mortality,
Culling, and Feed Efficiency

IN THE PENN. STATE SOLAR POULTRY HOUSE

Report Number 104
November 1982



The Pennsylvania State University - College of Agriculture
Department of Poultry Science - University Park, Pennsylvania

Panel: Extension in the Past, Present, and Future

Processing

Pat Curtis
Auburn University

Extension in the Past Present & Future: Processing

Pat Curtis, Auburn University

Past

- George Washington suggested the formation of the National Board of Agriculture in 1776
- 1884
 - Bureau of Animal Industry established (predecessor of FSIS)
- 1800s-1900s
 - Backyard flocks
 - Dual production chickens



Past

- 1902
 - Harvey Wiley & the "Poison Squad"
- 1906
 - Food & Drug Act
- 1930s
 - Chicken meat production, previously a subsidiary of the egg industry, broiler development began.



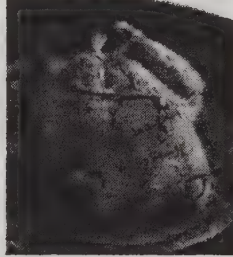
Past

- 1940s
 - Feed mills, hatcheries, farms & processors were separate entities.
- 1942
 - Government approved online evisceration
- Integration of the industry begin.
- Chickens were sold "New York dressed"
- 1952
 - Specialty bred meat chickens surpassed farm chickens



Past

- Following WWII
 - Explosive growth in poultry industry
 - Rapid expansion of market dressed poultry products
- 1950s & 1960s
 - Inspection focused on wholesomeness & visible contamination
- 1960s
 - Economic boom for poultry



Past

- Late 1960s & early 1970s
 - Brand names on chicken
- 1980s
 - Consumers prefer cut-up & further processed chicken
- 1985
 - Chicken consumption surpassed pork



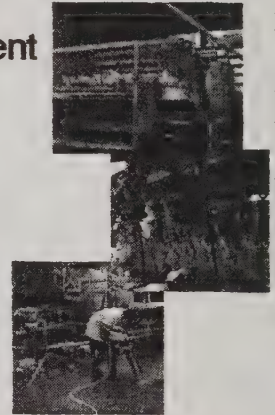
Past

- 1992
 - Chicken consumption surpassed beef
- 1998
 - HACCP regulations



Current

- Currently
 - Performance standards replacing many regulations
 - Proof of product safety shifted to plant
 - More automated processes
 - Increased interest in water conservation



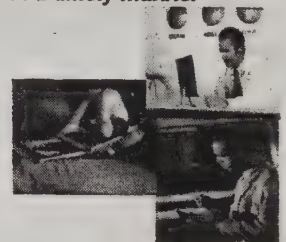
Future

- Increased food safety regulations
 - *Salmonella* serotyping
 - *Campylobacter* regulations
 - Additional *Listeria* performance standards
 - HACCP based egg inspection



Extension Specialists

- Extension/outreach personnel spend more time helping industry meet regulatory requirements
- Increased need to use technology to receive and deliver information in a timely manner
- Must help industry creatively solve problems



For more information

- National Chicken Council
 - <http://www.nationalchickencouncil.org/>
- USDA's Food Safety & Inspection Service
 - <http://www.fsis.usda.gov>

Panel: Extension in the Past, Present, and Future

Health/Food Security

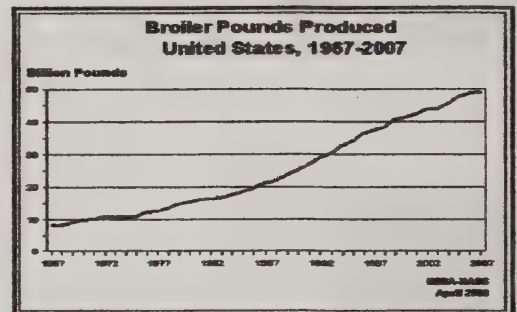
Billy Hargis
University of Arkansas

Health and Food Security: Past, Present, and Future (in 10 minutes)

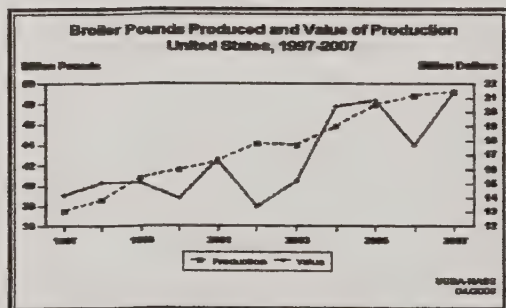
Billy Hargis
University of Arkansas
(And Else the Fortune Teller)



The Amazing Recent History of the Poultry Industry



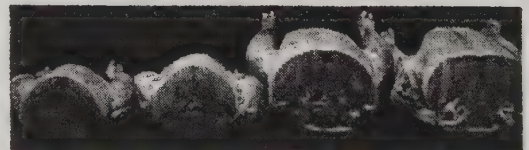
The Amazing Recent History of the Poultry Industry



ACRBC ACRBC Males – 2001 Feed



Ross Males – 2001 Feed



Day 43 Day 57 Day 71 Day 85

Estimated Change in 56-Day BW

Study	Years	g/yr
Sherwood (1977)	1957-1976	58
Havenstein (1994)	1976-1991	73
Havenstein (2003)	1991-2001	84

Extrapolation of Data

- Using Dr. Havenstein's 2003 estimates

Broilers in 20xx?

- 84 grams per year

- About 5 lbs @ slaughter now

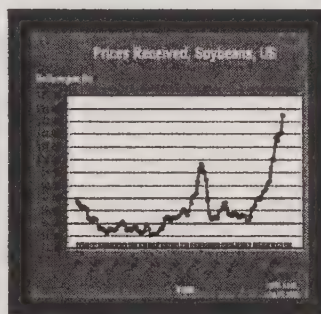
- Would be ~8.6 lbs in 2028



Recent Trouble

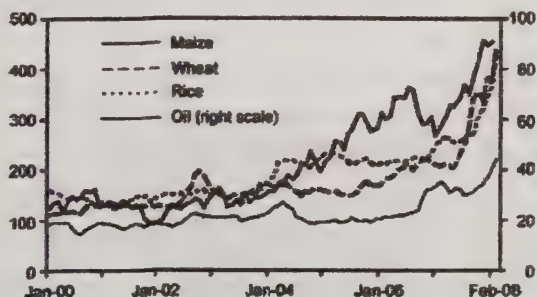


All Small Grains Affected



- Increased global demand
- Population growth
- Increased affluence and demand for meat and poultry
- Biofuel fiasco

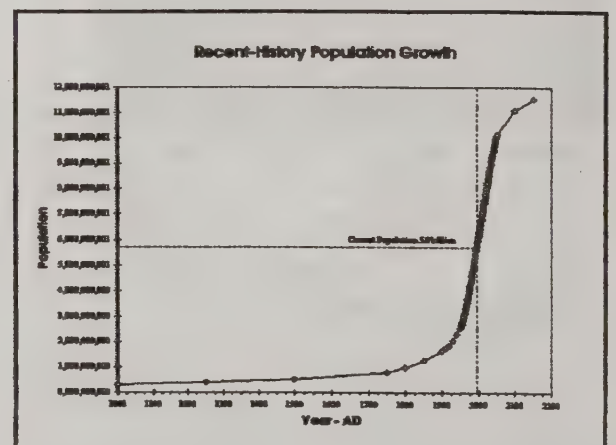
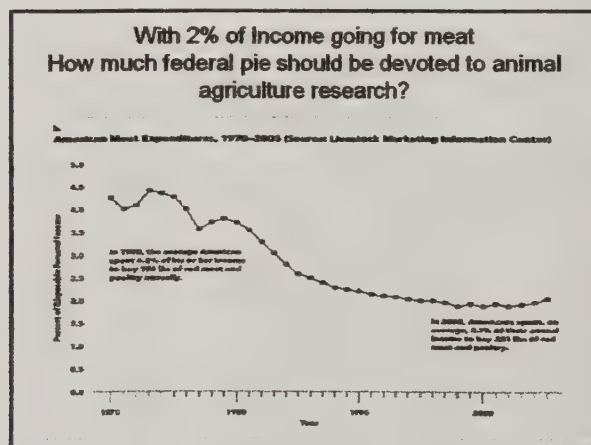
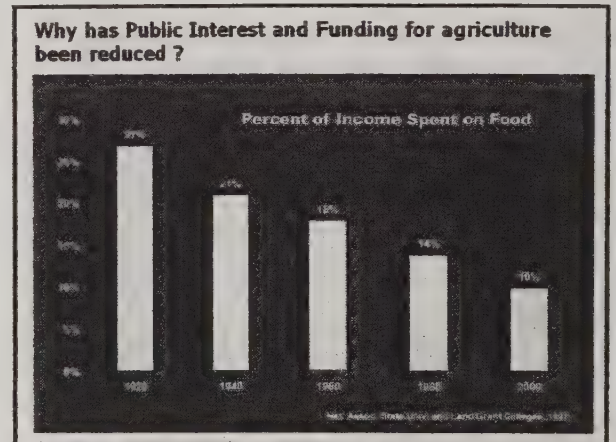
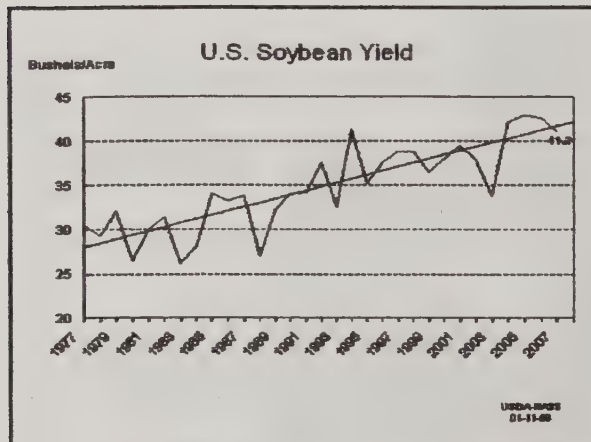
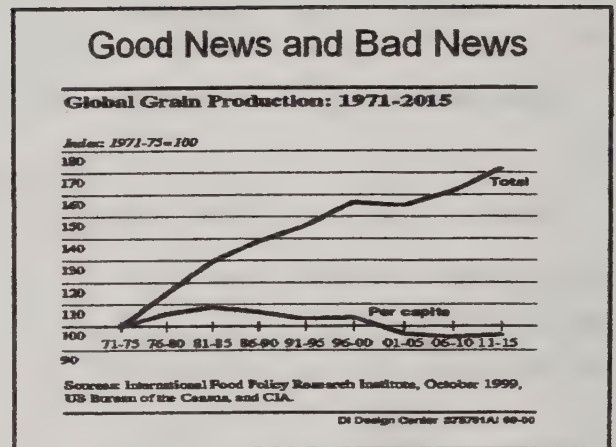
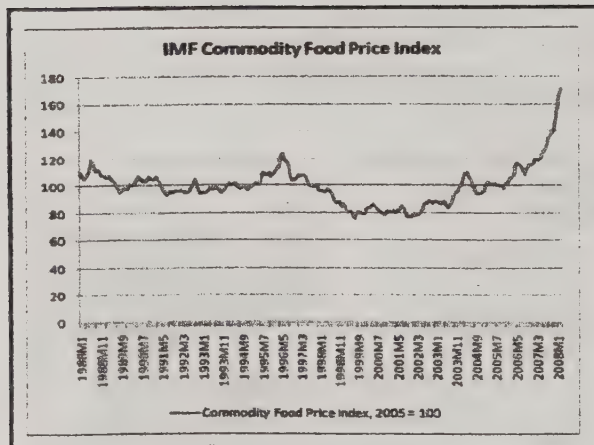
World Commodity Prices, January 2000–February 2008 (US\$/metric ton)

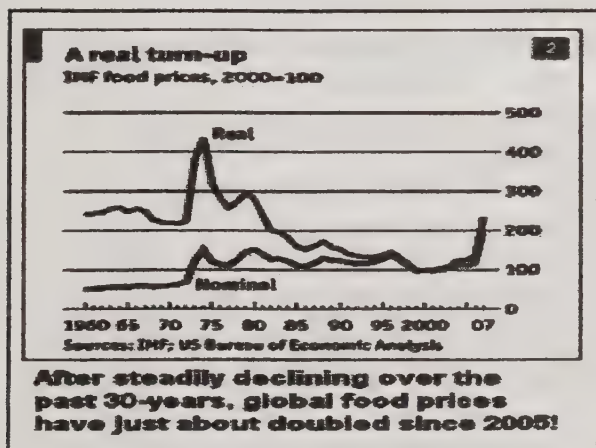
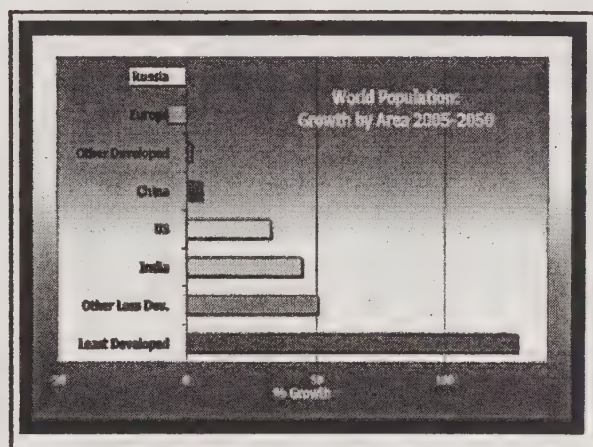
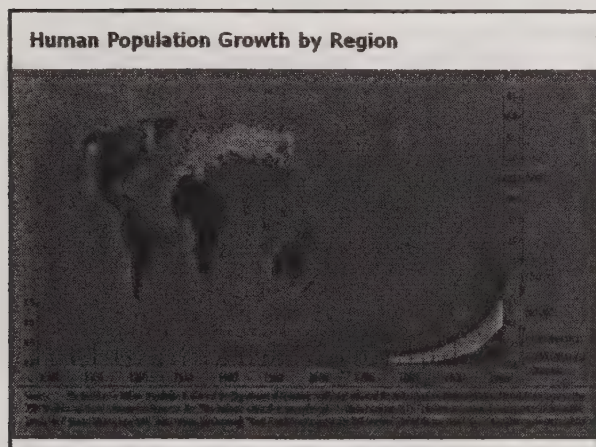
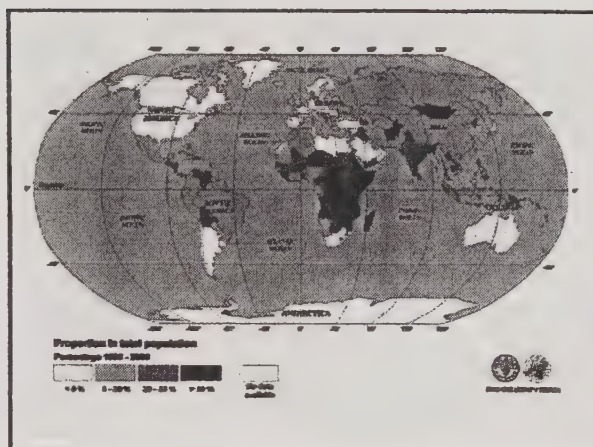
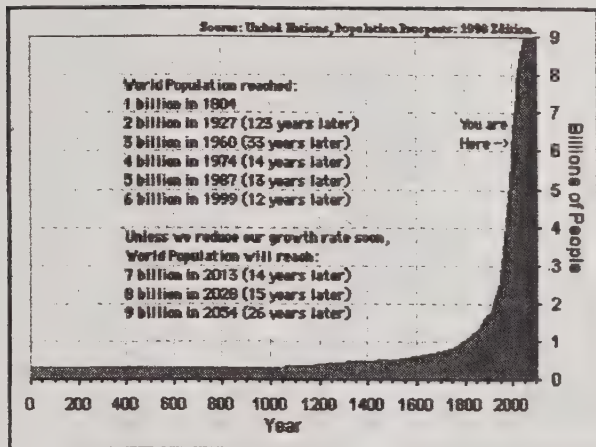


Sources: FAO international commodity prices database 2008, and IMF world economic outlook database 2007.

Source: FAO: World meat markets at a glance

	2004	2007 estm.	2008 /estm	Change: 2008 over 2007
	million tons		%	
WORLD BALANCE				
Production	278.5	274.7	280.9	2.5
Export meat	65.7	67.2	68.0	1.1
Feedstf meat	85.4	89.5	92.2	3.3
Payment	101.7	98.8	100.6	1.8
Other meat	15.3	13.7	14.0	2.0
Trade	21.4	22.5	23.1	3.0
Export meat	6.8	7.1	7.2	1.0
Feedstf	9.5	9.2	9.6	4.3
Payment	5.0	5.0	5.3	5.2
Other meat	0.8	0.9	0.8	-5.9





Growing Affluence or Shrinking Affluence

- FAO – Humans reach for Poultry as they become more affluent
- FAO – Poultry consumption increases as relative purchasing power declines

Demand for poultry is the first demand with Social and economic improvements.

Commodity	calories of feed/calories of output
beef	9.8
pork	7.1
poultry	5.7
milk	4.9

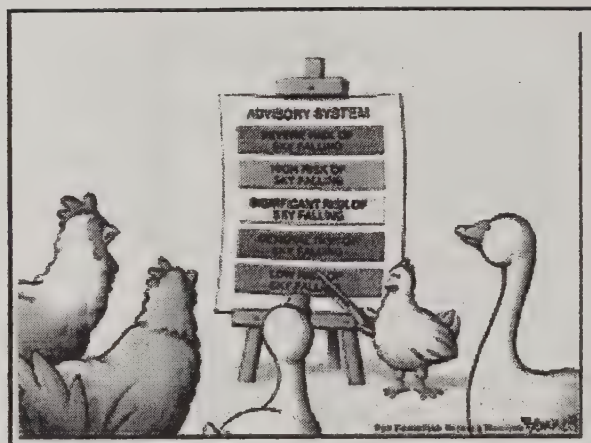
Animal Source Foods to Improve Micronutrient Nutrition and Human Function in Developing Countries

RECEIVED BY: [redacted] DATE: [redacted]

¹Current Researcher, Center of Marine, University of Miami, P.O. Box 243163, Miami, FL 33124-3163; ²Department of Biology, University of Colorado, Boulder, CO 80502

[illegible][illegible]

1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010, 2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2019, 2020, 2021, 2022, 2023, 2024, 2025, 2026, 2027, 2028, 2029, 2030, 2031, 2032, 2033, 2034, 2035, 2036, 2037, 2038, 2039, 2040, 2041, 2042, 2043, 2044, 2045, 2046, 2047, 2048, 2049, 2050, 2051, 2052, 2053, 2054, 2055, 2056, 2057, 2058, 2059, 2060, 2061, 2062, 2063, 2064, 2065, 2066, 2067, 2068, 2069, 2070, 2071, 2072, 2073, 2074, 2075, 2076, 2077, 2078, 2079, 2080, 2081, 2082, 2083, 2084, 2085, 2086, 2087, 2088, 2089, 2090, 2091, 2092, 2093, 2094, 2095, 2096, 2097, 2098, 2099, 2100, 2101, 2102, 2103, 2104, 2105, 2106, 2107, 2108, 2109, 2110, 2111, 2112, 2113, 2114, 2115, 2116, 2117, 2118, 2119, 2120, 2121, 2122, 2123, 2124, 2125, 2126, 2127, 2128, 2129, 2130, 2131, 2132, 2133, 2134, 2135, 2136, 2137, 2138, 2139, 2140, 2141, 2142, 2143, 2144, 2145, 2146, 2147, 2148, 2149, 2150, 2151, 2152, 2153, 2154, 2155, 2156, 2157, 2158, 2159, 2160, 2161, 2162, 2163, 2164, 2165, 2166, 2167, 2168, 2169, 2170, 2171, 2172, 2173, 2174, 2175, 2176, 2177, 2178, 2179, 2180, 2181, 2182, 2183, 2184, 2185, 2186, 2187, 2188, 2189, 2190, 2191, 2192, 2193, 2194, 2195, 2196, 2197, 2198, 2199, 2200, 2201, 2202, 2203, 2204, 2205, 2206, 2207, 2208, 2209, 2210, 2211, 2212, 2213, 2214, 2215, 2216, 2217, 2218, 2219, 2220, 2221, 2222, 2223, 2224, 2225, 2226, 2227, 2228, 2229, 2230, 2231, 2232, 2233, 2234, 2235, 2236, 2237, 2238, 2239, 2240, 2241, 2242, 2243, 2244, 2245, 2246, 2247, 2248, 2249, 2250, 2251, 2252, 2253, 2254, 2255, 2256, 2257, 2258, 2259, 2260, 2261, 2262, 2263, 2264, 2265, 2266, 2267, 2268, 2269, 2270, 2271, 2272, 2273, 2274, 2275, 2276, 2277, 2278, 2279, 2280, 2281, 2282, 2283, 2284, 2285, 2286, 2287, 2288, 2289, 2290, 2291, 2292, 2293, 2294, 2295, 2296, 2297, 2298, 2299, 2300, 2301, 2302, 2303, 2304, 2305, 2306, 2307, 2308, 2309, 2310, 2311, 2312, 2313, 2314, 2315, 2316, 2317, 2318, 2319, 2320, 2321, 2322, 2323, 2324, 2325, 2326, 2327, 2328, 2329, 2330, 2331, 2332, 2333, 2334, 2335, 2336, 2337, 2338, 2339, 2340, 2341, 2342, 2343, 2344, 2345, 2346, 2347, 2348, 2349, 2350, 2351, 2352, 2353, 2354, 2355, 2356, 2357, 2358, 2359, 2360, 2361, 2362, 2363, 2364, 2365, 2366, 2367, 2368, 2369, 2370, 2371, 2372, 2373, 2374, 2375, 2376, 2377, 2378, 2379, 2380, 2381, 2382, 2383, 2384, 2385, 2386, 2387, 2388, 2389, 2390, 2391, 2392, 2393, 2394, 2395, 2396, 2397, 2398, 2399, 2400, 2401, 2402, 2403, 2404, 2405, 2406, 2407, 2408, 2409, 2410, 2411, 2412, 2413, 2414, 2415, 2416, 2417, 2418, 2419, 2420, 2421, 2422, 2423, 2424, 2425, 2426, 2427, 2428, 2429, 2430, 2431, 2432, 2433, 2434, 2435, 2436, 2437, 2438, 2439, 2440, 2441, 2442, 2443, 2444, 2445, 2446, 2447, 2448, 2449, 2450, 2451, 2452, 2453, 2454, 2455, 2456, 2457, 2458, 2459, 2460, 2461, 2462, 2463, 2464, 2465, 2466, 2467, 2468, 2469, 2470, 2471, 2472, 2473, 2474, 2475, 2476, 2477, 2478, 2479, 2480, 2481, 2482, 2483, 2484, 2485, 2486, 2487, 2488, 2489, 2490, 2491, 2492, 2493, 2494, 2495, 2496, 2497, 2498, 2499, 2500, 2501, 2502, 2503, 2504, 2505, 2506, 2507, 2508, 2509, 2510, 2511, 2512, 2513, 2514, 2515, 2516, 2517, 2518, 2519, 2520, 2521, 2522, 2523, 2524, 2525, 2526, 2527, 2528, 2529, 2530, 2531, 2532, 2533, 2534, 2535, 2536, 2537, 2538, 2539, 2540, 2541, 2542, 2543, 2544, 2545, 2546, 2547, 2548, 2549, 2550, 2551, 2552, 2553, 2554, 2555, 2556, 2557, 2558, 2559, 2560, 2561, 2562, 2563, 2564, 2565, 2566, 2567, 2568, 2569, 2570, 2571, 2572, 2573, 2574, 2575, 2576, 2577, 2578, 2579, 2580, 2581, 2582, 2583, 2584, 2585, 2586, 2587, 2588, 2589, 2590, 2591, 2592, 2593, 2594, 2595, 2596, 2597, 2598, 2599, 2600, 2601, 2602, 2603, 2604, 2605, 2606, 2607, 2608, 2609, 2610, 2611, 2612, 2613, 2614, 2615, 2616, 2617, 2618, 2619, 2620, 2621, 2622, 2623, 2624, 2625, 2626, 2627, 2628, 2629, 2630, 2631, 2632, 2633, 2634, 2635, 2636, 2637, 2638, 2639, 2640, 2641, 2642, 2643, 2644, 2645, 2646, 2647, 2648, 2649, 2650, 2651, 2652, 2653, 2654, 2655, 2656, 2657, 2658, 2659, 2660, 2661, 2662, 2663, 2664, 2665, 2666, 2667, 2668, 2669, 2670, 2671, 2672, 2673, 2674, 2675, 2676, 2677, 2678, 2679, 2680, 26

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Reduced Antibiotics and other tools



Year	Percentage of U.S. Population Aged 65 and Over
1929	23%
1939	21%
1949	22%
1959	18%
1969	14%
1979	13%
1989	11%
1999	10%
2000	10%
2001	10%
2002	10%
2003	10%
2004	10%
2005	10%
2006	10%

- Global population is rapidly and markedly increasing
- Some countries are developing rapidly with increased economic resources
- Global Demand for meat is increasing (especially poultry)
- Cost of feeds will continue to increase
- Food prices in developed countries will increase markedly
- Public interest in (and funding for) agricultural research will likely increase in the near future
- GMOs will be accepted globally within the next decade
- Unavailability of food will result in overthrow of governments within the next decade

**JOINT ANIMAL, DAIRY, AND POULTRY SCIENCE
ASSOCIATIONS ANNUAL MEETING**

NATIONAL EXTENSION WORKSHOPS

San Antonio, TX

July 10, 2007

Edited by

Jacqueline Jacobs, University of Kentucky

Richard Reynnells, USDA/CSREES/PAS

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PREFACE

**R. D. Reynnells
USDA/CSREES/PAS**

The proceedings are provided to expand the opportunity to present important issues to students and persons working in food animal agriculture at all levels, and to the public. Policy development is enhanced by complete discussions of the issues and documentation of the evaluations and recommendations of professionals. These proceedings represent the organizing committee's effort to complete their responsibility to ensure more complete exposure of decision makers to the ideas presented by the speakers at these symposia. We greatly appreciate the approval of the Program Chair and professional organizations in allowing us the time for two symposia.

The first of two Combined Dairy, Poultry and Animal Science Extension symposia addresses accountability issues through presentations by Land Grant University (LGU) and Federal leaders. An essential component of accountability is effectively communicating our successes and the impact of our programs. In the second symposium, speakers discuss how successful programs are due to the effectiveness of Extension personnel as change agents and contributors in addressing emerging issues and our assistance in emergencies. Because not all speakers addressed these issues as a paper, power point slides are provided to assist the reader in knowing the speaker's thoughts on these issues.

JOINT EXTENSION SYMPOSIUM (PART 1)

THEME: **Accountability Issues in Extension: Identifying, Measuring and Reporting Impacts**

INTRODUCTION AND WASHINGTON UPDATE

Richard Reynnells

USDA/CSREES/PAS

SUMMARY

Extension and other personnel must stay abreast of technology and a wide range of societal and professional issues. The committee chose to emphasize extension issues common to all of the animal sciences, rather than several commodity specific topics. The workshop is divided into two sections, both of which are included in the on-site proceedings. The organizing committee was composed of a diverse group of representatives from the associations listed in this workshop title and from other members of their societies.

Casey Ritz, University of Georgia, is the recipient of the 2007 Poultry Extension Special Recognition Award for his exceptional contributions to regional and national extension programs. This award was initiated by Basil Eastwood for Dairy specialists and adapted for faculty in Poultry Science. Basil recently retired as a National Program Leader for Animal Production Systems at USDA/CSREES after 42+ years. His leadership and guidance will be greatly missed.

National Program Leaders (NPL) have added responsibilities associated with being a Co-Liaison to one or more Land Grant Universities. Our ever decreasing travel budgets are a source of concern. Continuing responsibilities include: departmental review team leader; liaison to several multi-state research committees; review of plans of work and accomplishment reports, Hatch projects, and grant proposals for various CSREES units; and, evaluate CRIS reports.

The National Poultry Extension Workshop (since 1988) and the Joint Extension Workshops (since 2001) have a long track record of accomplishment, which has been possible only through the dedicated efforts of volunteers. The Future Trends in Animal Agriculture 2006 symposium title is "Food Animal Agriculture in 2020". The National Poultry Waste Management Symposium Coordinator for 2008 is Casey Ritz, University of Georgia. Please contact Casey to volunteer to help on committees or for more information.

Create 21 is an initiative by the Board of Agriculture Assembly of the National Association of State Universities and Land Grant Universities which suggests the partnership between the US Department of Agriculture and the university community be re-framed. Current information may be obtained at <http://www.create-21.org>.

Procedures for USDA grants and deadlines can be found on the CSREES Internet site (<http://www.csrees.usda.gov>). CSREES/PAS now has yearly internal reviews of their various portfolios. It is important to note that there are increasing demands for accountability for all of us, which requires increased documentation by everyone in our system.

Michigan State and Purdue University are providing leadership in several animal welfare educational areas, including assessment and distance education programs. Coordination of the

Animal Welfare Assessment Contest will be at Michigan State for the next few years. Tyson Foods became the sponsor of the PSA Support Personnel Award in 2006. The 2007 recipient is Chet Utterback, University of Illinois. Cooperation and networking by specialists and industry are achieving impressive results. Continued teamwork and inclusive programs, including participation in multi-state research committees are essential. Consider volunteering to help on one or more of our many committees.

INTRODUCTION

The Joint Extension Workshop is divided into two sections, both of which are included in the on-site proceedings. The organizing committee was composed of official representatives from the American Dairy Science Association (ADSA), American Society of Animal Science (ASAS), and Poultry Science Association (PSA) as part of the Joint Meeting Extension Committee, the PSA Extension Committee, and other volunteers. Furthermore, these members obtained input from other members of their respective societies.

There are many commodity specific issues that need to be addressed, but the committee chose to emphasize extension issues common to all of the animal sciences. Accountability issues in extension were seen as a significant stumbling block to our success now and in the future. In addition to identifying and measuring impacts, not an easy task for extension personnel, we need to fully and concisely report our successes to ensure recognition of our contributions and thus continued financial support from Federal, state and university sources. It is very important for extension and research faculty to provide dollar estimates of their impact whenever possible. Speakers in the first workshop address these topics. In the second workshop, speakers discuss how extension personnel can be change agents, and our responsibilities in emergencies and controversial issues. The successes of these efforts are basic to our success in conventional programs and are part of our accountability process.

Our food animal production system has evolved from that sufficient to provide food and fiber to only a few people outside the farm family to one today that is responsible for significant exports and contributions to our balance of trade. There are some persons in society that prefer the "good old days" (that others say really were not all that good) and support those views through purchases in the niche markets. Others pretend to support this type production but in reality want to abolish animal production. Persons at the other end of the technology spectrum see the need to adapt the newest technology in equipment, nutrition concepts, etc. to produce food and fiber at the lowest possible cost. Extension should be available for assistance to persons in both camps. The highly technical industry expects extension personnel to be leaders in their area, and persons in the niche markets are likewise taxpayers who have specialized needs and who deserve our assistance. Especially given budget and personnel reductions, addressing all needs is impossible on an individual basis. Who is left out? Who decides? How can we do a better job?

Most consumers of products from conventionally raised animals demand cheap food. Even in the niche market area, consumers probably would not spend extra money on a product that did not differentiate itself in some manner. These diverse audiences place significant burdens on a system that is continually under financial pressures to consolidate and become more efficient in their outreach efforts. Which programs are cut? Or, are all extension efforts reduced, particularly because we cannot or do not quantify our impacts on the agricultural community and

society? In addition, most in extension and the industries believe we have a responsibility to respond to emergency situations with expertise and leadership. Who will help society understand the truths and half-truths and outright lies associated with controversial issues such as animal welfare and animal rights (two distinctly different issues)? Speakers for the second workshop will help us better understand the complexities of these issues.

This "Introduction and Washington Update" provides a short summary of events and opportunities of interest to the poultry and animal systems. Extension and other personnel must stay abreast of technology and a wide range of issues related to the environment, animal welfare, outreach, grant options, societal and professional concerns. Attempts to develop consensus around solutions to challenges in these areas, or to optimize responses to opportunities require cooperation and use of science-based data. These decisions, based on reason, recognition of our multiple responsibilities, and which avoid organizational manipulation, will hopefully achieve the best long-term solutions for agriculture and society. A team approach, focus on a common goal of assistance to agriculture and society, and cooperation such as through the use of a departmental advisory council, may provide solutions to complex questions related to limited resources. Collective efforts may exceed the value and quality of individual efforts that may also be prone to bias. The need for a unified agriculture and a teamwork approach is becoming increasingly important, given the attacks on food animal production and processing as related to animal welfare, the environment, or social issues. Disagreements associated with management options would not be a major problem if resolved by true consumer demand, where farmers are paid more for products produced in a specified manner. However, we must ask that even with consumers paying more for niche market products, how much of increased consumer costs actually goes to the farmer versus the myriad middle people.

If you find an item that would be beneficial to persons in other departments or commodity areas, please pass it along. Extension programs are inclusive. Anyone wishing to be part of our program planning and development is welcome. If you are not called, take the initiative and volunteer. We need volunteers to be on the 2008 PSA Extension Workshop organizing committee.

PERSONNEL

Special Recognition Award

The annual Poultry Extension Special Recognition (a.k.a. Golden Cup) Award was initiated to acknowledge the extra efforts and leadership of Extension faculty members that may not be recognized elsewhere. This award is taken directly from a similar presentation to Dairy extension personnel by Basil Eastwood. The 2007 award is presented to Casey Ritz, University of Georgia. For many years, Casey has been active in the Poultry Waste Management Symposium, the Triennial Extension Poultry Workshop, and the National Poultry Extension Symposium and has made many other contributions to water quality/waste management and other Extension programs at the local and regional levels. Casey has also provided leadership in the multi-state research committee currently designated as SDC-321, "Water Quality Issues in Poultry Production". Many other persons have made significant contributions to national and regional programs, and these efforts are also greatly appreciated.

In lieu of meaningful financial rewards, I also want to thank Jim Rock for the many years of service to this and other workshops as Evaluation Coordinator (Czar). Without his leadership and dedication the evaluations would not have been done, or at least not done as well.

USDA/CSREES

Basil Eastwood retired from CSREES as a National Program Leader for Animal Production Systems after 42+ years. Basil has made numerous significant contributions to extension such as the exceptional database systems he inspired, helped develop and promoted (e.g., see <http://USExtension.org>), leadership in the development of FARAD (Food Animal Residue Avoidance Database) and other residue avoidance programs, work in animal welfare, and many other activities. Basil was one of the last NPLs to have experience and training in Extension and he had a high level of commitment to Extension efforts. His dedication, expertise and leadership at CSREES will be greatly missed.

Mark Robinson (PhD, DVM) joined the CSREES Plant and Animal Systems Unit as National Program Leader for Animal Agro-security. Mark came to CSREES from the US Food and Drug Administration, Center for Veterinary Medicine, where he was Director, Division of Human Food Safety. Previous experience included work with the USDA/ARS as Animal Disease Research Unit Project Leader (transmissible encephalopathies; collaborative research on lentiviruses and herpesviruses), and FAO/IAEA Animal Production and Health program laboratory unit Head (harmonization or standardization of diagnostic assays for Brucellosis, FMD, etc.; Quality Assurance Program for Animal Disease Diagnostic Laboratories; OIE Standards Commission, "OIE Standard for Management and Technical Requirements for Laboratories Conducting Tests for Infectious Diseases").

Create 21 and the Proposed Reorganization of USDA's Science Agencies

Create 21 is an initiative by the Board of Agriculture Assembly (BAA) of the National Association of State Universities and Land Grant Colleges (NASULGC). You can find current information at <http://www.create-21.org>. There is a proposal by the BAA to re-frame the partnership between the US Department of Agriculture and the university community. You and your clientele need to seriously consider keeping up to date on this issue and to let your opinions be heard.

The following has been provided by Charlotte Baer, CSREES, regarding what has happened with various proposals to reorganize USDA agencies, including CREATE-21. Several proposals to reorganize the USDA agencies with authority for research, education, and extension have been introduced into the 100th Congress over the past several months as draft legislation for the Research Title (Title VII) of the Farm Bill.

The Secretary of Agriculture announced his proposals for the Farm Bill in January 2007, which include a proposal to reorganize the USDA's Research, Education, and Economics (REE) mission area. The Secretary proposes to create the Research, Education, and Extension Service (REES) through a merger of the Agricultural Research Service (ARS) and the Cooperative State Research, Education, and Extension Service (CSREES). The Secretary provided legislative language for this and other Farm Bill proposals in May 2007, which can be viewed at:

http://www.usda.gov/wps/portal/usdafarmbill?navtype=SU&navid=FARM_BILL_FORUMS.

A bill, S.1094, which is sponsored by Senator Debbie Stabenow (MI), was introduced in the Senate in April 2007 to establish the "National Institutes for Food and Agriculture" as an independent agency reporting to the Secretary of Agriculture. It draws heavily from the language in CREATE-21, a proposal by the National Association of State Universities and Land Grant College's (NASULGC) Board on Agriculture Assembly, which calls for the consolidation of four agencies (ARS, CSREES, Economic Research Service, and the National Agricultural Statistics Service) currently within the REE mission area as well as the USDA Forest Service Research and Development unit into a new "National Institutes for Food and Agriculture." A second similar bill, H.R. 2398, was introduced in the House by Rep. John Barrow in May 2007. Both bills have been referred to the relevant Congressional Committees for markup.

Two bills have been introduced in both the House (H.R. 2118 by Rep Collin Peterson in May 2007) and the Senate (S.971 by Sen. Christopher Bond in March 2007)) to establish the "National Institute for Food and Agriculture," which would create a new agency within the USDA that is solely a grant-making agency to support and promote 31 fundamental agricultural research. Both bills have been referred to the relevant Congressional Committees for markup.

The House Agriculture Committee is currently drafting Farm Bill language that proposes to establish an "Agricultural Research Institute," which would be comprised of six institutes reporting to the Under Secretary of USDA's REE mission area and coordinating the activities of relevant agencies, but would not consolidate any of the existing USDA agencies. It also establishes a "National Institute for Food and Agriculture" within CSREES to administer all competitive grants. The House Agriculture Committee is posting draft Farm Bill Legislative Language as it is being drafted at <http://agriculture.house.gov/inside/2007FarmBill.html>. Action on the Farm Bill will likely take place by September 2007, so it is prudent to stay informed about these proposals and their potential implications for USDA agencies and their stakeholders.

RESPONSIBILITIES

Department Reviews

Department reviews are an important part of the job, and are assigned through the CSREES system. The process to request department reviews has become flexible so reviews now tend to be scheduled throughout the year. There is a wide variation in the type departmental review requested by universities. Some request the traditional in-depth Sunday through Friday (or longer) review, while others prefer a more superficial Monday through Thursday review. In any case, we attempt to work with the department to support their needs.

Multi-State Research Committees

The National Information Management and Support System (NIMSS) was developed by the State Agricultural Experiment Stations to facilitate the tracking, retrieval, and management of the national portfolio of multi-state research projects. The reader is encouraged to access the NIMSS web site (<http://www.lgu.umd.edu>), search for any project by number or name, and to learn more about the following and other committees.

A concern expressed by some faculty is the difficulty in getting final approval of multi-state research projects (MSRP) based on field/applied research (versus more laboratory oriented research) approved through the regional NIMSS administrative committee process. There is a perception by faculty (and agreement with the concept) that administrators intend that the process to create a new MSRP is not an easy or automatic procedure. But projects that may have exceptional achievements in research to support outstanding extension activities, and have support of their administrative liaison, still have significant rewrite challenges. Others have reported they addressed the concerns the review committee identified, only to find a new review committee had further objections, or there were even objections to the corrections (180 degree flip-flop). Faculty do not have time to continually rewrite proposals based on what appear to be inappropriate concerns. This delay has caused some faculty to miss out on significant internal financial support by their university. It appears that more effective dialogue between reviewers (who many faculty believe should remain constant throughout the review process in order to maintain consistency of requirements) and committee members, and that greater significance be given research that supports extension and the related activities of the committee.

We have a new multi-state research committee, NC-507, "Midwest Poultry Research Program", the objective of which is to address the priority research needs of the poultry industry in the Midwest through the effective management of a competitive grants program. I am the liaison for this committee.

USDA/CSREES liaison responsibilities continue for several multi-state research projects:

1. NCR-1029, Applied Animal Behavior and Welfare; 2. S-1027, The Poultry Food System: A Farm to Table Model; 3. SDC-321 (formerly W-195), Environmental Issues Affecting Poultry Production; 4. NE-1022, Poultry Production Systems: Optimization of Production and Welfare Using Physiological, Behavioral, and Physical Measurements; 5. WERA-1902, Agricultural Bioethics (formerly WCC-204, Animal Bioethics); and, 6. NCERA-089, Swine Production Management to Enhance Animal Welfare. NC-1029, "Applied Animal Behavior and Welfare" (formerly NCR-131) has as objectives to develop, integrate, and validate behavioral tests and associated physiological measurements related to animal welfare, performance and health. The objective assists in USDA's Strategic Plan for 2003-2008, Strategic Goal 1, "Enhance Economic Opportunities for Agricultural Producers". Their efforts will advance research in animal welfare that will assist in designing welfare friendly production systems, adapted to the animals' biological requirements, as well as to meet concerns and criticisms of advocacy groups and society.

S-1027 (formerly, S-292), "The Poultry Food System: A Farm to Table Model", details their many accomplishments on their internet site at Auburn University. Their extensive objectives are related to Poultry Meat Safety, Poultry Meat Quality, and Egg Quality and Safety. Specific details are on the NIMSS web site.

SDC-321 (formerly W-195) has the title of "Nutritional and Management Abatement Strategies for Improvement of Poultry Air and Water Quality". The committee is in the approval process through the Southern Region to authorize a similar multi-state research committee as was authorized in the Western Region. The committee is very grateful to the Southern Region for agreeing to accept their proposal, and their commitment to the poultry system. The objectives for SDC-321 are: 1. Evaluate nutritional and management strategies to minimize the impact of

poultry production on air and water quality; and 2. Develop and disseminate science based information through outreach activities. The team has a long history of outstanding accomplishments in extension and practical research for the poultry system that facilitate protection of the environment. Joe Hess (Auburn; 334.844.2611) was elected to provide leadership for FY2007. Contact Joe or other members for details about how to join this important committee.

NE-1022, "Poultry Production Systems: Optimization of Production and Welfare Using Physiological, Behavioral and Physical Assessments" (formerly NE-127) likewise has a long history of assistance to the poultry system. This committee has the objective of: "characterize physiological, behavioral, and performance responses of poultry to their physical and social environments and to various management practices, with the ultimate goal of enhancing animal welfare and ensuring environmental soundness while maintaining viable production profitability".

WERA-1902, "Agricultural Bioethics", will be moving from the Western Region to the North Central Region where there is more of a critical mass to support this important committee. A year ago, the committee attempted to move to a full research committee. Even though the committee has significant educational and other accomplishments, little actual research focused on ethical issues is conducted so they decided it would be prudent to remain a coordinating committee at this time. The objectives of WERA-1902 are to: 1. Provide a forum in which animal scientists and non-animal scientists...may work together to examine and discuss contentious social and ethical issues; 2. Encourage the development and coordination of teaching, extension and research activities dealing with agricultural bioethics; 3. Develop mechanisms of outreach that would facilitate useful and open discussion between animal scientists and members of the public concerned about contemporary animal agriculture and its impacts; and 4. Provide the means for ongoing critical analysis of the animal science profession in the context of its ability to address moral and socio-political issues.

This committee and NCR-1029, are of utmost importance because they provide opportunities to be involved in emerging issues and contribute scientific and balanced responses to some of the concerns that will have tremendous impact on all of food animal production. It would be beneficial to your state's industries and your department if you would consider participation on one or both of these committees. Animal bio-ethics and animal welfare and behavior research helps faculty and the animal systems address management and ethical questions, and other issues of societal concern.

NCERA-089, "Swine Production Management to Enhance Animal Welfare", objectives are to provide clientele with unbiased scientific research on current and futuristic swine production management practices and to disseminate the research findings in a manner that encourages a systematic process to assess adaptation of new production management strategies or technologies....that result in improved animal welfare, care, handling or housing of the pig to enable opportunities for economic gain and greater societal responsibility in pork production.

I am also co-liaison for several other committees: 1. W-1173, Stress Factors of Farm Animals and their Effects on Performance; 2. NEAC-1000, Animal Science Advisory Committee; 3. SAC-002, Animal Sciences; and 4. NCCC097, Regulation of Adipose Tissue Accretion in Meat-Producing Animals.

Document Reviews

NPLs continue to review and approve Hatch Act projects submitted by all institutions participating in a Multi-State project before funds are released for project support. NPLs are instructed to also make a final review of proposed (new and revisions) of Multi-State projects and affirm that the programmatic goals and objectives are consistent with the Hatch Act, fall within the broad strategic objectives of USDA and CSREES, and that the project should be approved by the Administrator of CSREES. A comprehensive and thorough set of procedures has been established in each region for the development, peer review, and monitoring of progress for each project. NPLs also evaluate CRIS reports to define the percentage of a project's emphasis in specific areas such as animal welfare.

Plans of Work (POW), Accomplishment Reports (AR), and State LGU Liaison Activities

The system continues to evolve. Rather than merely be randomly assigned a state POW/AR to review (or those from two or more states), and provide an opinion as to whether or not USDA should accept (or request modification, or reject) the report, NPLs are now assigned one or more states for which the NPL will function as the Liaison for CSREES. For the next several years, I am scheduled as the Liaison for South Dakota (1862, 1994 Land Grant Universities) and North Carolina (1862 and 1890 Land Grant Universities). In addition to the review and approval of the 1862, 1890, and 1994 Land Grant University Plans of Work and Accomplishment Reports, the NPL will visit the campus, learn as much as possible about the programs of these universities, and provide explanations to university personnel regarding CSREES programs and functions. As with extension programs, one can achieve some success using the telephone, but on-site visits are essential. The NPL will provide feedback for CSREES administrators, and will attempt to assist LGU personnel in addressing specific questions.

It is important to recall that even for well-written reports the review process is a very time consuming activity, as it is for the state personnel who write the reports. The process can be relatively painless if the person submitting these documents will be thorough, concise, and follow directions. NPLs cannot approve the reports for further processing unless the reports meet the criteria provided in the directions.

It is also very important that faculty provide solid information to their administrative personnel who prepare the documentation of activities and the quantification of a program's impact (e.g., return on tax dollar investment) of these investments. There is increasing demand for accountability and these reports are crucial in establishing the value of research and extension programs.

Grant Reviews

NPLs are panel members for various grants administered through CSREES. For FY2007, I participated in a 1994 Land Grant University Panel. The most common problems with proposals include: forms are missing, or information on forms is incomplete or incorrect or inconsistent with other portions of the proposal (e.g., budget numbers appear excessive or do not match the budget narrative). The more grievous problems include replacing quantity for quality of content, not proof reading the proposal or not even using spell check, vague references to expected

outcomes or procedures to obtain data, and not following directions. Most Project Directors who submit proposals follow directions, with their proposals being excellent and well written, and have only minor problems (even if they are not funded). However, others require major revisions, with the Project Director's time better spent in other activities.

MEETINGS

National Extension Workshop

The proceedings have been published as an on-site handout for several years because they have been considered a valuable reference, which also documents the high quality of our workshops and numerous regional and national programs. Jacquie Jacob (MN) volunteered to edit the proceedings for 2007. Her time and efforts are greatly appreciated.

The Joint Meeting Extension Committee (Rich Stup, PA; Tim Safranski, MO; Dale ZoBell, UT; Joe Harrison, WA; Theresia LaVergne, LA; Clay Mathis, NM; Lane Ely, GA; and, June deGraft-Hanson provided leadership in creating the two Extension Workshops. Poultry Science Association Extension Poultry Workshop Committee members provided that input for these workshops are: Jacquie Jacob (MN); Curtis Novak (VA); Doug Kuney (CA); Audrey McElroy (Chair, VA); Casey Ritz (GA); Chris Fritts (Tysons); Sally Noll (MN); Joe Hess (AL); Theresia Lavergne (LA); Susan Watkins (AR); Ken Maciorowski (DE); Morgan Farnell (TX); and, Mike Davis (TX).

We continue to depend on James Rock, retired from the University of Connecticut, who has provided evaluation leadership for many years. On behalf of the attendees, I want to express our appreciation to committee members for the time and expertise they have provided to make our program relevant and a success. Please see me if you want to work on this committee for the 2008 Poultry Science Association Annual Meeting.

Future Trends in Animal Agriculture (FTAA)

The purpose of the FTAA is to create opportunities for positive dialogue between industry, government, and animal activists so that common ground may be identified and important issues addressed. The intent of the symposia is for industry and activist group personnel to also better understand the complexity of these issues. Discussions are to promote progress in identifying ways to improve animal well-being, which may also result in a balanced and comprehensive approach to dealing with related societal issues (e.g., environmental, food safety, and rural infrastructure).

After a series of one-day programs in the late 1980's and early 1990's, the FTAA efforts were discontinued. In about 2001, a committee composed of industry, activist group, specialty market representatives, and government renewed the concept and programs of the FTAA. They created a successful symposium in September 2002 in Washington, DC. The title was: "Current Status and Future Expectations of Food Animal Production Standards: Optimizing Animal Well-Being and Social Responsibility". They held a round table discussion in May 2003, "The Science and Ethics Behind Animal Well-Being Assessments", followed by the September symposium, "Sharing Costs of Changes in Food Animal Production: Producers, Consumers, Society & the Environment". In 2004, the symposium focus was "Local and Global

Considerations in Animal Agriculture: The Big Picture". The 2005 symposium title was "Certification and Education Programs: Current Status of Farm Animal Welfare". The 2006 symposium theme was "Addressing International Trade Complexities of Animal Welfare". In September 2007, speakers will provide comments on the future of food animal use, under the symposium title "Food Animal Agriculture in 2020". All symposia are open to the public, with the primary audience being agency decision makers and personnel, and congressional staff personnel and members. The meeting will hopefully result in enhanced respect for diverse opinions, and the goal of animal well-being rather than personal or organizational agenda well-being. Contact me for a copy of the current or any previous proceedings.

Southern Region Poultry Extension Workshop (Triennial)

The Triennial Workshop Chair for 2009 is Ken Anderson (NC). Non-poultry science personnel are welcome and encouraged to participate in these meetings. This workshop will move to a four year schedule in 2009 to avoid conflicts with other poultry meetings. Contact Ken (919.515.5527) to participate on support committees. Proceedings of the 2005 meeting are available as a CD from John Carey (TX; 979.845.4318).

National Poultry Waste Management Symposium

The 2008 National Poultry Waste Management Symposium will be held in Des Moines, Iowa in October. This workshop focuses on poultry, but the principles and most, if not all, the environmental issues apply to all animal species.

Casey Ritz is the Coordinator for 2008. The Alabama Poultry and Egg Association has volunteered to assist the organizing committee by being responsible for the financial aspects of the program. We could not have been nearly as successful in our several environmental protection programs over the years if not for the efforts of Wanda Linker, with support by Johnny Adams, at the Association. It is essential for the success of this meeting to have reliable volunteers to head the different committees, and personnel to work on the committees. Contact Casey Ritz (706.542.1325) to help at the 2008 workshop or to attend the meeting.

US Poultry and Egg Association (USPEA) International Exposition

We hold several organizational meetings at the USPEA meeting in January each year, and greatly appreciate their continued support. These include: National Poultry Waste Management Symposium, National Egg Quality School, National Egg Products School, several multi-state research committees, PSA Extension Workshop, PSA Extension Committee, Triennial Poultry Extension Workshop, and the American Poultry Historical Society Annual Meeting. Contact me if you want to schedule a meeting so it does not conflict with one of these meetings. Everyone is welcome at most of these meetings, particularly the APHS, NPWMS, and Extension committees. For other meetings, contact the Chairperson. The schedule is always available through my email distribution lists and at the registration desk for the Southern Poultry Science Society Annual Meeting. Contact me if you want to be added to the Miscellaneous Poultry Distribution List, which will ensure you receive this information.

Southern Poultry Science Society

The USDA/CSREES/PAS and the Southern Poultry Science Society (SPSS) sponsored the WERA-1902 led symposium, "Proactive Approaches to Controversial Welfare and Ethical Concerns in Poultry Science". The symposium was held immediately after the SPSS educational meetings at the World Congress Center in Atlanta on January 23, 2007. On-site proceedings were provided, and are available from the author. About 125 persons were in attendance. The symposium speakers addressed topics such as welfare as an ethical issue, ethical issues affecting poultry and alternative solutions, and electric, gas or religious slaughter alternatives.

USDA AND OTHER INFORMATION

Grants

The procedures to follow when applying for grants, release of grant information from CSREES, and application forms and deadlines, can be found at: www.grants.gov, or <http://www.csrees.usda.gov/fundingopportunities/requestforapplications>. If you cannot directly access the files, use of an abbreviated address may prove successful. Federal administrative research grants and special research grants were not provided for FY2007. It is not known if these funds will be available in FY2008.

Portfolio Evaluation

CSREES has chosen a review of our portfolio of programs as a cogent mechanism to justify our budget requests. The 2005 review of the Animal Protection and Welfare section resulted in a record score of 95. Our agency is now on a schedule of self-assessments until the next external review in 2010. The portfolio of programs on animal health and welfare is in the process of being evaluated.

Justification of our existence requires that each of us define the economic and/or societal impact of our efforts. Ask your industry or other clientele what dollar or other quantifiable value your programs have for individual companies or farmers, or the poultry system in which you work. Keep a record of your successes and impacts (similar to the "glory file" for Promotion and Tenure). Include this information in Accomplishment Reports, Success Stories, and other documentation of positive impacts of your programs. We use this information in our portfolio review documents and elsewhere. The days of just "knowing" we have value are over. Decision makers who control budgets must also know and appreciate our value.

PROJECTS

USDA Informal Animal Welfare Working Group

For the past few years, USDA personnel from several agencies have held quarterly meetings to discuss current issues related to animal welfare or bioethics that could impact the USA food animal production and processing system. We have a guest speaker from industry, academia, activist group or government agency discuss their programs. The intent is to stimulate

discussion among USDA personnel and to provide an opportunity for these personnel to network on a regular basis. If personnel are traveling or otherwise are not able to attend, a conference call option is available. I Co-Coordinate these meetings, which are not open to the public.

Diverse Voices in Agriculture

In late 2004, I began a series of informal and on-demand seminars on a wide variety of current topics with the primary intended audience being USDA personnel. This meeting is open to the public. The purpose is to provide an opportunity to present ideas and issues to USDA personnel and others that they would not be exposed to through normal channels. Discussions have included: gas stunning of poultry; discussions of CAST programs; comments from a representative of the Compassion in World Farming, and one from the National Animal Interest Alliance; and, a presentation on new technology for integrated HACCP programs.

Animal Well-being Assessment

The Animal Behavior and Welfare Group (ABWG) at Michigan State University shares leadership with Purdue University and the University of Wisconsin and others for development of the annual Animal Welfare Judging Contest intended for college level students. Students evaluate live animals or CD-based situations of farm animal management and provide their reasoning to judges. In 2007, students from six universities participated. The committee now has a permanent structure that will enable them to better organize the meetings, develop judging scenarios, and move the contest to the next level. In 2008, a section for veterinary students will be created. While stalled at this time due to lack of funds, we intend to transfer this concept to 4-H and FFA competition as an assessment of food animal husbandry practices. The youth programs would be geared to Seniors or Juniors in High School, and tied closely to the collegiate assessment contests.

Distribution Lists and Subscription email Lists

I will continue to rely on the e-mail as the primary system to get information to you. Tell me if you want to be added to lists, such as: animal rights/welfare, avian diseases, food safety, and those related to the multi-state research projects. Contact me if you think an additional listing would be beneficial to poultry or animal science professionals.

American Poultry Historical Society

The American Poultry Historical Society continues to recognize career contributions to the poultry system through the Hall of Fame award, and other contributions by their biennial award through the Poultry Science Association. For information on the Hall of Fame nomination procedure and deadlines, contact Nick Zimmermann (301.405.2805; University of Maryland), who coordinates this award, or Mickey Hall (Clemson University; 864.656.4022) who is the current President. The Historical Society welcomes persons at all levels within the poultry system, from industry to students to faculty. You do not need to be a Poultry Science Association Member—or be really old—we encourage young people in the poultry system, and students, to join the American Poultry Historical Society.

PSA 2007 Tyson Foods Support Personnel Award

Tyson Foods, Inc. accepted responsibility for sponsorship of this important award, starting in 2006. We gratefully acknowledge the support of Tyson Foods for their leadership and support of this important award.

The purpose of the Support Personnel Award is to acknowledge the long term contributions by support personnel, and to recognize their work as being critical to the ability of faculty, industry, or government personnel to receive the awards for which they are eligible to compete. This Award is the only professional level award of its kind, and supplements any existing university awards.

Mr. Chet Utterback, University of Illinois, Poultry Research Farm, Supervising Farm Foreman, was selected as the recipient of the 2007 Support Personnel Award for his exceptional contributions to the success of numerous poultry related programs at the University of Illinois. He supports a variety of projects for faculty and students in several diverse areas. The award will consist of: 1. a check for \$500; 2. a commemorative plaque, inscribed with the Charles' name and statement similar to: "For outstanding contributions to the Department of Animal Sciences at the University of Illinois."

The nine persons nominated for the 2007 award, as in previous years, were all exceptionally qualified for the award and had a wide range of backgrounds. Fifteen persons reviewed the nomination packages, with individuals asked to recuse themselves if any potential for conflict of interest existed or could be inferred. Nominators of persons not selected for this honor are highly encouraged to resubmit their packages for 2008. Others in industry, government and universities are likewise encouraged to nominate personnel in their unit. As stated many times before, I can say without reservation, that faculty members and other researchers are extremely fortunate to have such high quality personnel supporting their programs. As was the premise for initiating this award, many exceptional people are working in our system and should be recognized for their contributions.

ACCOUNTABILITY FOR ADMINISTRATORS

Bobby Moser
The Ohio State University

Paper not provided. See the power point presentation for comments.

LESSENING THE PAIN OF REPORTING

John B. Carey
Texas A&M University

First – don't look at it as a pain – make it work for you. Being organized in what and how you collect data can make the process serve your needs as well as those you report to.

The first important step in the reporting process is to simplify what you report. Keep the number of program areas and projects you report to a minimum. Three program areas should be sufficient to cover most specialists. If you try to keep track of eight different things, you will spend a lot of time trying to sort out what goes where. Keep it simple – report to broad program areas.

The quality of any report is only as good as the data upon which it is based. Thus the collection, recording and storing of day to day data is an essential step. Keep a daily log of phone calls and office contacts and anything else that does not leave an electronic footprint. Use the information available from your email program and your calendar to provide you with the raw data for periodic reports and updates of your core document (more later). Be certain that you collect pertinent information concerning web site use by clientele. At every educational event, measure the impact of the program. There is help available to accomplish this task. It does not need to be tedious or extensive – a basic assessment of impact is far better than no assessment at all. Being able to articulate and document the impact of program activities is critical regardless of where the report goes.

Using the data collected as described above, produce periodic narrative summaries of your activities. Often these reports are required activities. Use them as opportunities to update your core document and sweep together the data you have collected over the period that they cover. These reports are second to your core document in importance – keep them on file for future use.

Update your core document frequently – when things happen, not six months later. When a publication is accepted or produced, a grant proposed or accepted, an award received, put it in the core document immediately. This will only take a few minutes and will prevent a lot of frantic searching prior to some deadline. Waiting several weeks to update the core document will inevitably result in something being left out or incorrectly recorded.

The core document is the home base of all information. It is the main dossier for your promotion and tenure. It is your treasure chest of information. The information in this document (if current) can be used to produce almost all other summary reports. If the real-time or monthly data that you collect is fed into this core document as it is collected, then the production of a quarterly or annual or P&T report will not entail nearly as much work.

The main parts of the system are as follows:

Keep things simple

Collect data on a real-time basis

Produce narrative and statistical reports frequently

Feed this periodic data into your core document frequently

Use your core document as the repository of all knowledge

Extract information from the core document of summary (annual, quarterly) reports.

Make it useful to you – for your benefit.

WHAT INFORMATION DO I NEED TO KEEP EXTENSION FUNDED

**James Wade
NASULCG**

Paper not provided. See the power point presentation for comments.

HOW PLANS OF WORK AND ANNUAL REPORTS ARE USED AT THE FEDERAL LEVEL

Bart Hewitt
USDA/CSREES/OA

Paper not provided. See the power point presentation for comments.

RESULTS BASED GRANT MAKING THE EXTENSION RISK MANAGEMENT EDUCATION PROGRAM: A DIRECT APPROACH TO RESULTS VERIFICATION

Jon Newkirk
Washington State University

Our Mission: To help Farm and Ranch Families Succeed through Targeted Risk Management Education

The National Extension Risk Management Education program is centered around a Results Based Grant Making and Verification Process. Borrowing a phrase from Stephen Covey's "The 7 Habits of Highly Effective People", the program asks applicants to begin with the end in mind. We ask grant applicants to begin by identifying the results that the farm and ranch participants will learn, achieve, or apply as a result of the projects they hope we will fund.

The results for the participants are the "end" we want grant applicants to begin with. After they have the results in mind, it is much easier to design a program that will deliver those results. In most Extension systems I am aware of; ultimately the leaders in those systems want to know about the results/impacts/outcomes of the program. Our experience shows that if the results have been identified first and are clearly in mind, then verification that the participants have achieved the results (measurement) is straight forward.

Why Results Based? Our grant program is results based because risk management results for agricultural producers are what the Congressional stakeholders were asking for. But beyond that, in today's world of accountability, reporting program activities alone fall well short of the necessary standard. At a time when funders at all levels are asking for impacts, outcomes, and results, I suggest that by identifying the results of your program first, and then designing a program to deliver those results rather than the other way around, keeps you focused on what matters, and reduces the frustration on how to measure impacts. Once you have them identified and measured, the reporting is easy.

By identifying the results first, you know from the beginning what it is you need to measure. There is a large incentive to figure how to measure and report impacts. Those of you able to account for the resources you use in terms of results/impacts/outcomes, rather than just activities, will garner an increased share of the public resource base. You will also be more competitive in many grant programs and you will make your Extension Administrators very happy.

The Extension Risk Management Education program is administered through four Regional Risk Management Education Centers and a Digital Center which manages our on-line application and reporting system. The Regional Centers are located at the University of Delaware, the University of Nebraska Lincoln, Texas Cooperative Extension, Washington State University Extension, and the University of Minnesota (Digital Center).

Each of the four Regional Centers offers 20 to 30 awards each year of up to \$50,000 for projects that are designed to teach/train agricultural producers to manage the risks associated with farming and ranching. While the core risks we are concerned about are financial, other kinds of risks have been addressed in funded projects. The grant program is open to Land Grant and other University faculty, including Extension Educators, and any organization, public or private with the capacity to deliver risk management education to agricultural producers and manage a federal grant. Our enabling legislation puts an emphasis on public/private partnerships.

The Results Based Grant approach is significantly different from most grant programs or program planning concepts. Our selection process places the most value on the producer results you identify and then uses our short application to inform the selection panel on whether the project you propose is likely to deliver the identified results for producers. While the program was designed by a group of Economists, the concepts are useful more broadly. Our application, award, and reporting system are all on-line. The applications of successful applicants are automatically transferred to the reporting site making it easy to report project results and activities. Your report will not die in someone's desk drawer as all funded project reports are available to the public via the Web at <http://www.agrisk.umn.edu/>.

Our grant program is designed around the concept that the return on the investment of the awards we give are the results that farm and ranch participants gain. Our investment returns are not the activities that the grant awardees conduct. If we were purchasing a product, that product would be the risk management improvements producers make.

We use a two stage application process. The first stage is a two page pre-proposal which identifies the proposed results of the project for the participants, a short description of the project (150 words), a section on "why" the applicant thinks that the producers will participate in the project, and who the project team will be.

The second stage is a full application. Only a portion of those submitting a pre-proposal are asked to submit a full proposal (average length seven pages). Keys to success in having one's project chosen for funding is to have clearly identified results for participants and to have identified how those will be measured. Next the applicant must have a believable statement on why producers will want to participate in the project. Identifying why producers will want to participate is very different than identifying the need for them to participate. The need must be there as well, but the demand for the project is a key determinant in funding,

A good application will identify clear results for participants, identify how the results will be verified, and convince the panel that the agricultural producer participants will achieve the risk management results by participating in the project. A grant applicant that cannot identify what the risk management results will be for the participants will have a difficult time verifying or measuring the results of that project. The same holds true for an Extension program at any level.

In Summary, beginning with the end result in mind and building a program to deliver those results can facilitate identifying and reporting program impacts. Those who learn to program for impacts and capture and report those impacts will not only be successful in our grant system, they will be successful in the Extension system of the future.

JOINT EXTENSION SYMPOSIUM (PART 2)

THEME: Changing the Future of Food Animal Production

WELCOME/INTRODUCTION

Richard Stup
The Pennsylvania State University

Paper not provided. See the power point presentation for comments.

CHANGE MANAGEMENT—HOW TO GET ORGANIZATIONS TO CHANGE

Monty Hemenover
Avenues for Change

Paper not provided. See the power point presentation for comments.

PANEL: ADAPTING EXTENSION TO RAPIDLY CHANGING INDUSTRIES

A Pork Industry Experience

M. T. See

North Carolina State University

PROLOGUE

Extension programs have been delivered to the pork industry by North Carolina State University since 1918. W. W. Shay was North Carolina's first Extension Swine Specialist and held that position from 1918 to 1935. Mr. Shay is considered the father of North Carolina's commercial swine industry (Jones, 1995). Since 1918, there have been thirty Extension Swine Specialists in NC. Currently, in the Animal Science Department, we have 3.3 faculty FTE in swine extension shared across five positions, as well as, three FTE in technical support of swine extension. Extension specialist in the Departments of Food Science, Agricultural Resource and Economics, Soil Science, Crop Science, Entomology, and Biological and Agricultural Engineering also work closely with the NC Pork Industry.

A large, vibrant pork industry in NC while not exactly "planned" was certainly encouraged. The pending change in tobacco resulting from the release of the Surgeon Generals report in 1964 spurred leaders at NCSU and the NC Department of Agriculture to look for alternative possibilities that would maintain and increase farm income. All of the computations resulted in pork production coming out at the top or near the top of the list of alternatives (Humphries, 1965). This led to a series of actions by NCSU, NCDA, NC Farm Bureau, allied businesses and the newly formed NC Pork Producers Association that encouraged the expansion of NC pork production. Dr. Ira Porterfield, Head of Animal Science, stated, "The Midwest is largely ignoring North Carolina as a pork producing state. I hope they'll continue to ignore us. Then one day they will wake up and realize that North Carolina has become the No. 1 pork producing state in the nation." While this did not come to pass, NC producers certainly made the effort. Jack Kelley, Extension Livestock Specialist from 1945 to 1965, put together a team and created a positive attitude that helped NC to dramatically expand its pork industry (Jones, 1995). Producers in NC passed the first mandatory "check-off" program for pork in 1963 at 5 cents per head. In 1964, NCSU and NCDA jointly constructed and begun operation of a Swine Development Center. The successful joint development project explored new ideas in every phase of swine production and served as a training center. The unstated objective was to bring pork production and economic prosperity to the eastern part of the state (Harris, 1972). From 1964 until 1993 over 25,000 people visited this center. At the county level 62 Extension Agents were specifically assigned swine responsibilities in 1963. An Area Extension Swine program was also established in 1964 leading to Extension Swine Specialists to be located in three regions of the state. By 1982, the NCSU Animal Science Department would have seven Extension Swine Specialists.

This set of circumstances and encouragement allowed the NC pork industry to experience a prolonged period of steady growth. In 1965, NC ranked 12th nationally in pork production and by 1990 had risen to 6th, had more hogs in confinement facilities than any other state, and Sampson County had become the top ranked swine county in the nation.

RAPID CHANGE

Recent decades have seen rapid growth of the NC pork industry. Since 1990, the NC pig crop increased four-fold from 5.1 million head to 20.1 million pigs in 2006. North Carolina farms accelerated their growth to achieve further economies of scale, adopt technology, and fulfill the demand for hogs created by the opening of Smithfield Foods Tarheel Division in 1992, the largest pork plant in the U.S. at 32,000 head per day. During the 1990's, the NC pork industry primarily followed a vertically coordinated model where large swine production companies had marketing agreements with the pork processors in the region. However, a large segment of the NC industry quickly became fully vertically integrated when Smithfield Foods acquired and consolidated several swine production companies; Brown's of Carolina (organized 1991), Carroll's Foods (purchased 1999), and Murphy Farms (purchased 2000), into what is now Murphy-Brown LLC. Industry consolidation continues today with Smithfield Foods more recent acquisitions of Vall (2002), Alliance Farms (2003) and Premium Standard Farms (2007). These acquisitions give Smithfield a 17% share of live hog production, and a 31% share of pork processing in the U.S.

Rapid growth and the construction of increasing larger farms soon led to environmental concerns and the passage of legislation regulating NC swine operations in 1992, 1995, 1996, 1997, and 1998. Senate Bill 1217 had tremendous ramifications for extension programs requiring producers with liquid waste management systems to complete a 10 hour course and examination for certification and then achieve six hours of continuing education every three years for renewal. House Bill 515 placed a moratorium on the construction of liquid swine waste management facilities effectively stopping industry growth in 1997.

Growth relied primarily on contract production. The increase in size of the pork industry was primarily associated with increasing farm size. The US census of agriculture reports that in 1982 there were 11,390 farms with hogs and that number has shrunk to 2,542 farms in 2002. Currently there are 2,216 permitted facilities, farms with an inventory greater than 250 head and a liquid waste management system.

Today NC is recognized internationally for its large, modern and vertically integrated industry. Rapid growth was accompanied by rapid changes, including increases in vertical integration, changing regulations, expanding workforces, and rapid technology adoption. These trends continue today along with industry consolidation, internationalization, and changes in language and culture of workers (See, 1999b). Changes in consumers are also affecting extension programs. Increasing value demands on quality and safety of food and the welfare of animals is again changing pork production methods. With changes of this magnitude occurring among our clientele, changes in programming offered and delivery methods were required.

ADAPTATION OF EXTENSION SWINE HUSBANDRY

Extension programs for the NC pork industry continue to evolve to meet the changing needs and structure of the more vertically integrated industry. North Carolina producers require certification programs for operators of waste management systems, applied research and technical information on production topics, production training and problem solving (See, 1999a). The Extension Swine Husbandry staff conducts a multi-faceted educational program providing research-based material in management, genetics, veterinary medicine, nutrition, reproduction, housing and nutrient management to stakeholders in the pork industry. Programs are jointly developed and delivered by the Specialists and Staff at NCSU and the Field Faculty located at each County Extension Center. In-service training programs for agents implementing the latest research knowledge (e.g. Moser et al., 2004) are a major component in preparing field faculty to deliver programs to the integrated industry.

Local delivery of extension programs to the pork producers centers on manure management allowing county agents to specialize in an area where every producer and contract grower needs assistance. In addition, NC has state legislation requiring manure management plans and continuing education of producers. Therefore this has become a large undertaking that allows extension to deliver needed, relevant programs and gives all personnel an area of expertise. County programs are also deeply involved in 4-H which the NC Pork Industry strongly supports for its role in public education of agricultural and workforce development.

Traditional programs in nutrition, health, reproduction, genetics and management occur predominantly among peer groups including extension specialists, industry scientists and managers. Understanding the management and decision making structure of producers is required to design appropriate technology transfer methods. Our swine extension programs have a large component of production research, addressing industry needs and technology adoption. As financial resources for extension have declined, our programs have grown through increased partnership with producer associations, production companies, and allied industry. We jointly offer educational programs with NC Pork Council, National Pork Board, and specific production companies on a cost-recovery basis. Electronic information transfer has become common place and allows us to reach a broad audience. Changing our extension programs as the NC pork industry has changed has allowed us to continue to provide relevant, research based information to pork producers helping them to efficiently and responsibly produce a quality product for consumers. A key element in guiding this change was a long-range planning retreat by NC Extension Swine Specialists in 2000. During this period, planning sessions were held with county extension agents and producers. Some of the outcomes were the development of information delivery strategies for different types of clients, planning multi-disciplinary activities, and creation of an identifiable graphic image.

NATIONAL SWINE EDUCATORS IN-SERVICE

A success story in swine extension is the National Swine Educators In-Service training hosted each year by National Pork Board. This conference is planned by Extension and Adult Educators to provide cutting edge information and training to in-turn be delivered to producers. This program was started in 1996. National Pork Board covers all conference expenses for participants including program costs, lodging and meals. In NC, we have been fortunate that the NC Pork Council financially supports the travel costs of our staff to attend the conference

which is held in the Midwest. To date, 71 different people from NC have attended including NCCES field faculty, NCSU specialists and staff, vocational agriculture instructors, community college faculty, and faculty and staff from NC A&T State University.

CONFERENCES AND MEETINGS

Annual education events include the North Carolina Pork Producers Conference cosponsored with the NC Pork Council, Regional Pork Conferences, the Carolina Swine Nutrition Conference in cooperation with Carolina Feed Industry Association, and the Healthy Hog Seminars. Diverse educational programming is presented at the annual pork conference while the Regional Pork Conferences in Wilson, Roxboro and Edenton are primarily targeted at continuing education credits for operators of animal waste management systems. These programs and the facilitation of other county delivered programs have helped to provide continuing education credit to the certified operator in North Carolina. The Healthy Hog Seminars have become a primary source of veterinary and production information for North Carolina pork producers. These seminars are a joint effort by faculty from the Cooperative Extension Service, College of Veterinary Medicine and the North Carolina Pork Producers. Extension specialists also take a role in planning the annual Carolina Swine Nutrition Conference.

CLOSED SESSION TRAINING PROGRAMS

Closed session training programs for specific production companies are also developed and delivered. Dealing with large workforces that increasingly have less understanding of agriculture and/or the entire pork sector training is vitally important. In an increasingly vertically integrated industry, it is of importance to all parties to have an understanding of the total business chain. Clients are looking for a competitive advantage by having a workforce that understands the total business and the business objectives. Closed sessions allow for open discussions on all aspects of the business that can not/will not be held with competitors or customers present. Increased training at every level leads to process improvement.

An example of this type of program is Smithfield Pork 101. Smithfield Pork 101 is a two day workshop of lectures and hands-on activities designed to address the educational needs of various employees' of the world's largest producer of fresh and value-added pork products. The Pork 101™ program was developed a decade ago by the National Pork Board and American Meat Science Association. This flagship program was developed for hog producers across the nation to give them an appreciation of how live production impacts meat quality. However, it is estimated that the farmer and the packer each contribute about half to deviations in pork quality. With this in mind, Animal and Food Science Specialists worked together to combine live animal production and meat science expertise to develop this more comprehensive educational program. They expanded the curriculum to include topics on new product development, pig production, fat quality, animal welfare, judicious use of antibiotic, cost accounting, and marketing based entirely on Smithfield's business model. Program evaluations are continuously used to add and remove topics and develop materials focused on participant needs.

Since the program initiation in 2004, seventeen Smithfield Pork 101 workshops have been conducted for 465 Smithfield Foods associates. Participants come from diverse operations and

departments including farm personnel, in-plant production supervisors, accountants, lawyers, the Vice President of Research and Development, sales personnel, and information technology personnel. Bringing this mix of people together has created an "unintended circumstance" that has truly benefited the program. A large company often is challenged to provide a forum that allows for the free exchange of ideas, failures, and successes between very different operational groups. This program facilitates open lines of communication.

Comments by participants have been very complimentary. When asked to indicate which topic or activity was most beneficial or valuable, without exception every topic has been referenced by participants. This indicates that the curriculum is well balanced and is addressing the needs of the clientele. The most positive endorsement of the program came from Mr. Larry Pope, President and CEO of Smithfield Foods Inc, "PORK 101 is an outstanding program that I wish everyone in our company could participate in."

Additional programs to address pork quality issues of producer cooperatives (See, 2004) have been developed to both educate producers and benchmark quality across farms and processing location. A program based on the Pork 101 platform targeted towards small sustainable hog producers has been developed in cooperation with the NC Choices program at NCSU. These workshops are based on the same curriculum but adapted to meet the needs of these specialized producers.

PUBLICATIONS

It is our goal to publish and present information in as many formats as possible. Extension Swine Husbandry publishes Swine News eleven times each year to provide research updates and a calendar of events (See, 2000). Other publications include the Animal Science Facts series of bulletins that give an in depth discussion on topics that are not covered adequately in other sources. An Annual Swine Report details the results of research projects and was the first to be published on CD-Rom. Participants at all of our conferences are provided with written proceedings. All of these publications and a host of additional information are available at our website at <http://mark.asci.ncsu.edu> which hosts visitors from around the world every day (See and Armstrong, 1996). As Extension Specialists, we also extensively published in peer-reviewed journals for both research and extension audiences. We also try to take advantage of opportunities to publish in the popular industry press.

Utilizing many different formats allows for universal access to information among producers. With the great range of producers in today's pork industry, information, especially research results, needs to be prepared for publication for audiences at a least three educational levels and published in at least four formats.

RESEARCH

Research in response to pork industry identified needs has become a major thrust of the swine extension program. All Extension Swine Specialists are expected to maintain productive extramurally funded research programs that are both individually directed and collaborative. It is not enough for Extension faculty to merely transfer information but for acceptance, and

credibility to a sophisticated industry they must also be developing new knowledge in priority areas.

The North Carolina Swine Evaluation Station located on the Central Crops Research Station in Clayton plays a major role in these efforts. This facility provides the unique opportunity to source genetics from various locations and to raise hogs in a controlled environment while measuring feed intake and growth (See, 1997). The facility provides 100 pens and the ability to handle ten different feeds. One advantage of this facility is the ability to rapidly respond to industry research questions. The North Carolina On-farm Swine Performance Testing Program also plays a role in the measurement and evaluation of both live animals and carcasses. Real-time ultrasound services are available to any North Carolina producer for a small fee and are extensively used in breeding programs and research.

The state of NC continues to make investments in swine extension and research programs. New research facilities have been built at several locations for swine programs (1988 commercial and 2005 alternative). Investment has been made in infrastructure for animal and poultry waste management programs (1998) and diseases (2006). We currently enjoy a new meat processing laboratory (2005), and will open the only commercial scale research, teaching and extension feed mill in the U.S. this year. We are also completing a swine nutrient management research facility and remodeling buildings for metabolism studies.

PORK INFORMATION GATEWAY

The Pork Information Gateway or PIG is an interactive and intuitive web-based tool that producers and others can use to find information on a wide range of subjects related to production of pigs and pork (See and Meisinger, 2006). The tool has a virtual library of resources including peer-reviewed fact sheets and other publications, glossary, and pork industry pictures, but the unique component is the frequently asked questions portion of the program. This is the most extensive collection of research based, peer-reviewed information available to the pork industry. To visit PIG go to <http://ncsu.porkgateway.org> or follow the link from <http://mark.asci.ncsu.edu>.

Content in the Pork Information Gateway covers sixteen areas: 1) Production and Management, 2) Business Management, 3) Human Resources, 4) Swine Health, 5) Animal Behavior and Welfare, 6) Breeding and Genetics, 7) Swine Nutrition, 8) Reproduction, 9) Facilities and Equipment, 10) Environmental Stewardship, 11) Marketing, 12) Pork Quality, 13) Pork Safety, 14) Youth Projects, 15) Statistics, and 16) Worker Health and Safety. Currently, the site includes a database of about 200 fact sheets, over 2000 frequently asked questions, 2000 reference materials, 100 images, a glossary and a calendar of events. However, the information available is growing daily as new questions are posed and answered and new sources of information added to the database.

The Pork Information Gateway was developed through a national collaboration of specialists and educators that was led by the U.S. Pork Center of Excellence, North Carolina State University and National Pork Board. The mission of the U.S. Pork Center of Excellence is to add value to the pork industry by facilitating research and learning for U.S. pork producers through national collaboration. The Pork Information Gateway has been accepted as a community of practice in eXtension and will launch there in 2007.

DISTANCE EDUCATION

Self learning programs distributed via CD-Rom have been developed in cooperation with the National Pork Board covering a broad range of subjects primarily targeted toward people directly involved in daily animal care. Versions of these programs are also available in the Spanish language. Several learning courses are also constructed in a manner that allows larger organization to modify content to reflect specialized standard operating procedures. These courses have also been delivered in facilitated sessions via the internet (See and Belstra, 2001).

We also utilize distance education technologies to cooperate with colleagues in other states. Jointly delivering programs via the internet or satellite television. We don't utilize distance education widely in-state due to the geographic concentration of the pork industry and it's proximity to campus.

PUBLIC EDUCATION

Programs are also designed to improve consumer knowledge and attitudes about animal agriculture. Direct educational contacts have been made with 275,000 consumers and many others have been reached through 3,400 newspaper and mass media stories that have been produced. Eighty percent of the consumers reached have demonstrated an increased understanding and appreciation of animal agriculture after exposure to these programs.

FUTURE

As the pork industry continues to change, we will have to remain adaptive and responsive to developing needs. Furthermore, cooperative efforts will become even more important. Multi-disciplinary programs including extension, research and academic faculty are needed to address increasingly complex questions and deliver information to clients in a greater variety of ways. Cooperation with industry associations, producers, agencies and allied industry in the development and delivery of programs will continue to increase as well.

Extension will need to have greater involvement in basic research programs. The primary role is communication of new technology to producers and producer needs to researchers. This is the traditional role that extension has played. However, extension's involvement must move more to the basic than the applied end of the research spectrum.

From a funding standpoint we will have to become more entrepreneurial in methods of program delivery. Programs with cost recovery will become standard and we need to be more creative in how we jointly develop programs with producer associations and allied industry.

A more striking change, I believe, we need to take in extension is a greater role as advocates for animal agriculture. Blockstein (2002) argues that there is a continuum from data to advocacy and that this model resembles the scientific reporting that extension currently engages in for lay people. The question is, "Is there a point in this continuum that extension should not cross?". Advocacy is defined as pleading, arguing or the active support of

something and an advocate is one that pleads the cause of another. With the large disconnect between the general public and agriculture that exists today, what is wrong with pleading the cause of agriculture based on data and information that we have developed. Should "Agricultural Extension" not be an advocate for U.S. agriculture? The concern that is usually raised is that if we become advocates in many of the processes involving agriculture we will lose our credibility. However, many members of the general public already view agricultural research and extension programs as industry advocates. Blockstein (2002) also provides a framework for maintaining scientific credibility while going beyond the presentation of the data:

1. Follow the facts and tell the truth
2. Obey the "rules" of science
 - a. Base interpretation upon data and conclusions that are peer reviewed
 - b. Explain how conclusions are reached
 - c. Present margins of error
3. Present caveats
4. Identify uncertainty
5. Help to distinguish between uncertainty and guesswork
6. Avoid hyperbole

This framework reads like a guideline for developing extension programs. Animal agriculture in the U.S. is facing many pressures and the general public, and elected officials no longer have knowledge of agricultural processes and are far removed from any background in farming. One of the most valuable roles we in extension can play in the future is using our peer-reviewed, science based knowledge and openly serve as advocates for the producers we serve to ensure the safe, high quality, affordable U.S. food supply of the future.

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PANEL: ADAPTING EXTENSION TO RAPIDLY CHANGING INDUSTRIES

Dairy Industry

E. R. Jordan

The Texas A&M University System

ABSTRACT

Over the last 50 years, the dairy industry has undergone dramatic changes. The number of milking cows has been cut from 21 million head on 2.9 million farms in 1955 to just over 9 million on less than 80,000 farms in 2005; thus herd size has grown from 7 cows per herd to over 110 cows. At the same time production has tripled, from less than 2700 kg of milk per cow to 8900 kg per cow. Numerous technological advances from artificial insemination to total mixed rations have been adopted by the industry to enhance productivity of the modern dairy cow. Extension educators have facilitated the transfer of these technological advances by using on-farm demonstrations, conducting producer educational meetings, and generating fact sheets and newsletters to disseminate information. Through these techniques producers progressed through the five stages of adoption for new technologies—awareness, interest, evaluation, trial and adoption. With the advent of computer technology and internet distribution of information, innovative producers are accessing information through alternative sources and implementing practices without waiting for unbiased scientific results on the benefits of a product. Extension will continue to have a role in differentiating beneficial products or practices for innovators and early adopters; however the time line for evaluation will be accelerated. This accelerated pace of evaluation will result in the Extension professional functioning as a researcher and educator simultaneously. An increasing workforce at the non-managerial level provides another audience for Extension educators. Although the focus of these educational programs will be on proper techniques and explaining the importance of given procedures, communication and problem solving skills should be addressed as well. To effectively reach this audience, educational programs will frequently be in a second language and written materials will be translated or an alternative medium (video or podcast) may be required for those with limited formal education. Although many techniques traditionally used to promote change can be adapted to today's clientele, it is imperative for Extension to remain relevant and to adopt modern delivery methods.

INTRODUCTION

Over the last 50 years, the dairy industry has undergone dramatic changes. The number of milking cows has been cut from 21 million head on 2.9 million farms in 1955 to just over 9 million on less than 80,000 farms in 2005; thus herd size has grown from 7 cows per herd to over 110 cows. At the same time production has tripled, from less than 2700 kg of milk per cow to 8900 kg per cow.

Numerous technological advances from artificial insemination to total mixed rations have been adopted by the industry to enhance productivity of the modern dairy cow. Extension educators have facilitated the transfer of these technological advances by using on-farm demonstrations, conducting producer educational meetings, and generating fact sheets and newsletters to disseminate information. Chase et al., (2006) summarized the reduction in extension staffing which has occurred across the United States as a result of budget cuts. In addition, as resources within departments have been reallocated, many positions have been converted to joint appointments between extension and research or teaching. Concurrently with the resource reduction, dairy producers changed their requests to more in-depth, research-based information rather than generalized information. In addition, two other target audiences emerged, agri-service professionals and farm employees (Chase et al., 2006).

CHANGING METHODOLOGIES

Today's extension professional must adapt delivery methods to meet the demands of a changing dairy industry with a more diverse target audience. Traditionally, extension educators have facilitated the transfer of these technological advances by using on-farm demonstrations, conducting producer educational meetings, and generating fact sheets and newsletters to disseminate information. Through these techniques producers progressed through the five stages of adoption for new technologies—awareness, interest, evaluation, trial and adoption.

With the advent of computer technology and internet distribution of information, innovative producers are accessing information through alternative sources and implementing practices without waiting for unbiased scientific results on the benefits of a product. Extension will continue to have a role in differentiating beneficial products or practices for innovators and early adopters; however the time line for evaluation will be accelerated. This accelerated pace of evaluation will result in the extension professional functioning as a researcher and educator simultaneously.

Franz (2007) urged transformation of extension education be based on adult learning theory, such as the transformative learning theory and critical reflective theory. Both of these theories support extension's role as a facilitator in solving complex problems (i.e., environmental and animal welfare issues); applied research as a means to "support more democratic learning environments through knowledge co-creation among, faculty, field staff, and stakeholders; interdisciplinary approaches"; and accountability for the value of the educational output. One critical element in both theories is that the clientele provide direction to the educational experience. The following case studies demonstrate clientele directed educational programs.

CASE STUDY, COOLING PONDS

In October 2001, a Sr. Regional Milk Specialist with the Food and Drug Administration (FDA) wrote the Director of the Division of Milk and Dairy - Texas Department of Health (TDH) regarding cooling pond use. As a result of that letter, the TDH published Milk Information Release 01-1 dated October 30, 2001, which prohibited the use of the cooling ponds until such time as they have been replaced with an approved design.

Some Texas producers approached extension for assistance indicating that cooling ponds were essential for milk production during times of heat stress and discontinuation of their use would impact the sustainability of their farms. Data from Florida was available which indicated that cooling ponds in that state had been beneficial to milk quality, as well as animal welfare. By mid-December, a survey was sent to County Extension Agents for distribution to producers in their counties who had cooling ponds. General information regarding the use of the cooling ponds was collected as well as a release for using milk quality information collected by the Federal Milk Market Administrator.

In addition to the County Extension Agents contacting producers, industry representatives from Monsanto and Purina, representatives of both the SW and SE Divisions of Dairy Farmers of America, and veterinarians cooperated in identifying producers with cooling ponds and encouraged them to submit their surveys. One County Extension Agent and his local veterinarians organized a meeting to discuss how the public policy issue was being addressed. Press releases were sent to and published by Texas Dairy Review, Country World and Southwest Press regarding the survey. A total of 55 producers with cooling ponds responded by the end of January. Subsequently evaluation of the impact of cooling ponds on somatic cell counts (an indicator of udder health) in the herds responding was completed (Jordan et al., 2003).

During late January and early February, the SW and SE Divisions of Dairy Farmers of America developed resolutions to support the continued use of cooling ponds, which were passed by their respective Councils. In addition, the Texas Veterinary Medical Association (TVMA) passed a resolution supporting the continued use of cooling ponds. These groups submitted their resolutions to the Texas Department of Health, FDA, and various state and federal legislators.

On February 22, 2002, the Texas Department of Health and Texas Cooperative Extension co-sponsored a meeting between producers, regulators, and industry representatives with over 70 people representing TVMA, Dairy Farmers of America, Texas Department of Health, Texas Cooperative Extension, U.S. Food and Drug Administration, Oklahoma Department of Health, Monsanto, Purina, media and dairy producers in attendance. Extension presentations from Florida and Texas stimulated discussion, leading to the development of a consensus set of recommendations regarding the design and operation of cooling ponds which were submitted to the Texas Department of Health. State Senators and Representatives in the key dairy areas affected, as well as the Texas Farm Bureau, contacted Texas Department of Health with their support for allowing cooling ponds based on our recommendations. In late March 2002, the Texas Department of Health re-issued Milk Information Release 01-1 (Revised) allowing cooling ponds in Texas that met the Texas Cooperative Extension proposed criteria.

During the May 2003 National Conference on Interstate Milk Shipment (NCIMS), a presentation was made documenting that cooling ponds did not negatively impact milk quality (as evaluated by somatic cell counts) or milk safety (as evaluated by bacteriological culture of bulk tank samples). A proposal had previously been developed and submitted to NCIMS to amend the Pasteurized Milk Ordinance (PMO) to allow cooling ponds as an acceptable practice on dairy farms. Although the original proposal was amended during the conference, NCIMS recommended to FDA that the PMO be changed to allow for cooling ponds. In September, FDA concurred with the recommendation of the NCIMS to permit the use of cooling ponds on dairies. The PMO revision reflects the change resulting from the collaborative efforts of TCE and other dairy industries in the state of Texas to national regulations governing the sale of milk.

In addition to evaluating the impacts on milk quality and safety, Tomaszewski et al. (2005) evaluated DHI record to estimate the impact of the cooling ponds. For accountability purposes the change in milk production was then used to estimate the annual impact on gross income that could have been lost if cooling ponds had been prohibited unless producers installed an alternative cooling system.

CASE STUDY, SYNCHRONIZATION PROGRAM

In 1998, a group of Texas dairy producers identified reproduction and adoption of reproductive technologies as impediments to financial success. The issues they identified with estrus-synchronization programs included: cost, paperwork required, timing of injections, and seasonal issues. A producer was identified that was willing to participate in a year-long demonstration to compare two different synchronization programs so that the four main impediments to implementation could be addressed. In the first study, commands were developed for the dairy management software that was commonly used to automatically enroll cows into an estrus-synchronization program based on their parturition date or nonpregnancy diagnosis. In addition, the demonstration study illustrated the program was effective on a year-round basis, and verified that all injections and inseminations could occur in the morning; thereby alleviating some of the concerns with summer heat stress (Jordan et al., 2002).

The cost issues were addressed in a second trial, initiated in 2000. Two estrus-synchronization treatments were tested to determine if estradiol (ECP) could replace gonadotropin releasing hormone (GnRH) as the final hormonal treatment in a timed artificial insemination protocol in which all cows are bred within seven days of the end of the voluntary waiting period. At the timed insemination, 27.4% of the cows became pregnant following the ECP treatment, while 26.1% became pregnant after the GnRH. Since pregnancy rates were similar, producers could use either product effectively. Other factors such as cost, ease of use and inseminator confidence will be the determining factors in deciding which product to use. This protocol was tested in collaboration with the University of Florida and has subsequently been adopted across the country (Pancarci et al., 2002).

As a result of meetings conducted in collaboration with pharmaceutical representatives and local veterinarians during 2001, fifteen dairy producers started using the synchronization program we had evaluated in previous demonstration trials. In addition, five producers that had initiated the synchronization program in 2000 expanded their reproductive management programs to include resynchronization. Thus a total of 18,500 cows were impacted by adopting a new reproductive technology in 2001. By the end of 2002, additional producers with approximately 20,000 cows had been assisted in implementing estrus-synchronization programs. Once the innovators and early adopters successfully improved their reproductive programs, estrus-synchronization programs continued to be adopted by producers across the state and across the country in an effort to enhance fertility. Each year additional herds in Texas have initiated the programs and most of the producers that have started the program have continued the program. In addition, bull studs and pharmaceutical companies have taken the programs and used them throughout the country. Most record-keeping packages and DHI programs have modified their software programs to facilitate accurate treatment lists.

INTERNET TECHNOLOGY

Dairy extension specialists have been at the forefront of internet technology adoption with development of internet discussion groups such as Dairy-L and on-line accessibility to the National Dairy Database (Chase et al., 2006). The explosion of information on the internet "has cheapened the value of information traditionally offered by Extension programs by offering an array of similar information, free of charge in most cases" (Ray, 2007). According to Ray (2007) the virtual extension specialist's (VES) web presence will extend much further than just providing glorified directories and advertising programs and short courses. The VES will take on the identity of the web site, using it as their primary contact, becoming a lead navigator, abandoning paper information, tracking evaluation sources, expanding web content and incorporating information from other institutions. Recently eXtension, has been launched as a means to provide a virtual Extension program. These programs are dependent upon clientele repeatedly returning to Extension websites either directly or through searches. For Extension to remain in the forefront of education delivery, systems must anticipate the needs of clientele and deliver relevant materials with minimal effort by the client, perhaps through automated delivery such as an RSS (Rich Site Summary) feed. The RSS feed facilitates delivery of web content that is changing frequently so that people retrieve the latest content from web sites without visiting each site individually.

Although computer delivery and applications must be adopted to extend extension's reach, educators must be cognizant that not all producers will embrace that delivery method. Hall et al. (2004) evaluated the delivery methods used in conducting an educational program for beef producers that was conducted over a five month period using at-home reading materials, lectures, web-based materials, bulletin board discussion groups and hands-on workshops. In their conclusions, they reported limited client use of the web-based materials and bulletin boards as a delivery method. With the advent of most milk marketing cooperatives encouraging data downloads of component information, dairy producers may be more receptive to obtaining materials from the web; however, continual evaluation of their preferences is required to insure the relevancy of delivery systems.

CHANGING AUDIENCE

An increasing workforce at the non-managerial level provides another audience for Extension educators. Frequently, the focus of these educational programs will be on proper techniques and explaining the importance of given procedures (Dalton and Jensen, 2006); however Brasier et al. (2006) reported producers indicated communication and problem solving skills of milkers, feeders, mechanics and machinery operators were also desired or required. To effectively reach this audience, educational programs will frequently be in a second language and written materials will be translated or an alternative medium (video or podcast) may be required for those with limited formal education. Dalton and Jensen (2006) identified many in the non-English speaking community feared attending formal classes. Their response was to predominantly use an oral delivery system with all materials in Spanish and to select meals based on attendee's ethnicity.

As brochures, fact sheets, and other informational pieces are developed for non-English speaking audiences special considerations should be made during the development process. Besides considering the culture of the intended audience, Ingram et al. (2004) recommended

brevity, using headings and subheadings to break up large amounts of information, limiting sentence (25 words) and paragraph (60 words) length, setting quotes off to the side, and leaving adequate white space. In addition, images that include members representing the intended audience can enhance the acceptance of the publications.

CHALLENGES TO TRANSFORMATION

The transformation of Extension programs to learner directed and participatory research presents challenges as well as opportunities. Traditional research has been more global with results pertinent to a broad target audience, while extension specialists adopting participatory research may find that results are very locally oriented. This may present challenges in publishing and funding these projects. Many alternative publication routes are becoming available with the expansion of the internet; however these may not be peer reviewed or viewed as favorably by promotion and tenure committees. With the reduction in and increased competition for Federal funding, extension will have to develop creative methods of funding, perhaps from dairy producer organizations or even individual producers.

Another issue with participatory research and learner directed programs is the lack of continuity in research efforts that may result. Traditionally researchers have worked in a narrow area and over the course of a career built upon the foundation established by previous research. If extension transformation occurs, research and educational programs for those holding joint appointments will tend to become issue related with definite beginnings and conclusions. One alternative that has been adopted for environmental programming in Pennsylvania is to utilize extension associates that are 100% extension rather than faculty with split appointments to deliver programs (Ishler et al., 2006). Although this may not work in all instances, exploration of this concept warrants investigation in many circumstances.

With the changing demographics of larger and fewer producers, the metrics used to evaluate extension programs must change as well. The number of cows impacted by extension programming and the value of the change may be required rather than the number of producers who gained knowledge. Promotion and tenure committees will need to appreciate and reward procurement of grant dollars to support learner directed programs and participatory research. A return on investment for the grant dollars may be measured in policy or regulatory changes rather than in peer reviewed publications.

CONCLUSIONS

Although many techniques traditionally used to promote change can be adapted to today's clientele, it is imperative for extension to remain relevant that modern delivery methods be adopted. The transformation of extension so that it maintains relevancy requires more clientele directed learning and participatory research. Educational efforts must capitalize on new technologies available via the internet and expand the diversity of the audience from manager/owner to employee. Finally, promotion and tenure committees must acknowledge and reward the alternative methods adopted so extension employees can succeed in a transformed system.

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WHAT IS EXTENSION'S RESPONSIBILITY IN RESPONDING TO EMERGENCY AND CONTROVERSIAL ISSUES?

Jon Ort
North Carolina State University

Paper not provided. See the power point presentation for comments.

APPENDIX A

SPEAKER PROGRAM

JOINT EXTENSION SYMPOSIUM (PART 1)

THEME: Accountability Issues in Extension: Identifying, Measuring and Reporting Impacts

MODERATOR: Tennille Knezacek
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Introduction and Washington Update.

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Accountability for Administrators

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How to Lessen the Pain of Reporting: Multiple Uses for the Same Information

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What Information do I need to keep Extension Funded

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How Plans of Work and Annual Reports are Used at the Federal Level

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Background and Future of the Risk Management Education Center

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Discussion, Led by Moderator

JOINT EXTENSION SYMPOSIUM (PART 2)

THEME: Changing the Future of Food Animal Production

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Welcome/Introduction

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Change Management—How to Get Organizations to Change

Monty Hemenover
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Panel: Adapting Extension to Rapidly Changing Industries

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What is Extension's Responsibility in Responding to Emergency and Controversial Issues?

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Discussion led by Moderator

APPENDIX B

2007 POWER POINT PRESENTATIONS

JOINT EXTENSION SYMPOSIUM (PART 1)

THEME: Accountability Issues in Extension: Identifying, Measuring and Reporting Impacts

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JOINT EXTENSION SYMPOSIUM (PART 2)

THEME: Changing the Future of Food Animal Production

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JOINT EXTENSION SYMPOSIUM (PART 1)

**THEME: Accountability Issues in Extension: Identifying, Measuring
and Reporting Impacts**

Introduction and Washington Update

Richard Reynnells
USDA/CSREES/PAS

INTRODUCTION AND WASHINGTON UPDATE

2007 ADSA/PSA/AMPSA/ASAS Joint Annual Meeting

Richard Reynnells

National Program Leader, Animal Production Systems

USDA/CSREES/PAS

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Workshops organized by representatives
from all societies: ADSA, ASAS, PSA

Joint Meeting Extension Committee

Poultry Science Association Extension
Poultry Workshop Committee

Volunteers

Jim Rock (retired, CT) Evaluation Czar

Emphasize Extension issues common to all
commodity areas

Accountability seen as block to our success
Identifying and measuring impacts
not easy for Extension

Extension personnel as change agents
adapting to changing industries; who changes?
responsibilities in emergencies and
controversial issues

Workshop divided into two sections

1. Accountability Issues in Extension:
Identifying, Measuring and Reporting
Impacts
2. Changing the Future of Food Animal
Production

Papers from both workshops are
included in the on-site proceedings

How do we address specialized needs from clientele with diverse expectations and skills

Who is not helped when budgets are cut?

How can we do a better job?

In-state; multi-state regionalization?

Impact of consumer demands for cheap food

Do farmers get a fair share of consumer \$\$\$

Washington Update

PERSONNEL

- ***Special Recognition Award***

The annual Poultry Extension Special Recognition (a.k.a. Golden Cup) Award

Casey Ritz
University of Georgia

USDA/CSREES

- Basil Eastwood retired
 - NPL Animal Production Systems
 - database systems (<http://USExtension.org>)
 - residue avoidance programs (FARAD)
 - animal welfare
 - dairy, recently also swine, beef
 - Extension background

- Mark Robinson

- NPL, for Animal Agro-security
- From US FDA, CVM; Director, Division of Human Food Safety
- Previously with USDA ARS, Animal Disease Research Unit Project Leader (transmissible encephalopathies, etc.)
- FAO/IAEA Animal Production and Health program laboratory unit Head (harmonization or standardization of diagnostic assays for Brucellosis, FMD, etc.); Quality Assurance Program for Animal Disease Diagnostic Laboratories; OIE Standards Commission participant

- ***Department Reviews***

An important part of the job, and are assigned through the CSREES system.

The scheduling of reviews has become flexible so they are accepted for assignment throughout the year.

Multi-State Research Committees

USDA/CSREES liaison

1. NCR-1029, Applied Animal Behavior and Welfare;
2. S-1027, The Poultry Food System: A Farm to Table Model;
3. SDC-321, Environmental Issues Affecting Poultry Production;
4. NE-1022, Poultry Production Systems: Optimization of Production and Welfare Using Physiological, Behavioral, and Physical Measurements;
5. WERA-1902, Agricultural Bioethics; and,
6. NCERA-089, Swine Production Management to Enhance Animal Welfare

USDA Co-Liaison

1. W-1173, Stress Factors of Farm Animals and their Effects on Performance;
2. NEAC-1000, Animal Science Advisory Committee;
3. SAC-002, Animal Sciences; and
4. NCCC-097, Regulation of Adipose Tissue Accretion in Meat-Producing Animals

Document Reviews

- Review and approve Hatch Act projects submitted by all institutions participating in the various Multi-State projects before funds are released for project support
- The **National Information Management and Support System (NIMSS;**
<http://www.lgu.umd.edu>)
 - Developed by State Agric. Expt. Stations
 - Facilitate the tracking, retrieval, and management of the national portfolio of multi-state research projects
- Evaluate CRIS reports to define percentage involvement of the project in specific areas such as animal welfare.

Plans of Work and Accomplishment Reports

- Review/approval of state Plans of Work and Accomplishment Reports: research and extension
- Even for well-written reports the review process is a very time consuming activity, as it is for the state personnel who write the reports

The process can be relatively painless **iff** the person submitting the documents will
be thorough,
concise, and
follow directions.

NPLs can not approve the reports for processing unless the reports meet the criteria provided in the directions

It is very important:

faculty provide solid information to their administrative personnel who prepare the documentation of activities and whenever possible,

the impact (return on tax dollars spent) of investments

There is increasing demand for accountability and these reports are crucial in establishing the value of research and extension programs.

- We must define the economic and/or societal impact of efforts
- Ask your clientele what quantifiable value your programs have for individual companies or farmers, or the poultry system in which you work
 - Use for Accomplishment Reports, Success Stories, and other documentation of positive program impacts
- As stated in 2004, the days of just “knowing” we have value are over.

Liaison to State LGU

Starting in 2006

NPLs will also serve as a Liaison to LGUs

SD (1862, 1994 LGU)

NC (1862, 1890 LGU)

Review, approve POW/AR;

Provide information to LGU administrators;

CSREES programs and functions

Help remove bottlenecks, address problems

Learn LGU needs and report to CSREES

Grant Reviews

- Administer or are panel members for various grants
- 2007 Federal Administrative Research Grants and Special Research Grants not available; do not know status for 2008

The most common problems include:

- forms are missing
- information on forms is incomplete or incorrect or inconsistent with other portions of the proposal (e.g., budget numbers do not match narrative)

- Some significant problems include:

- replacing quantity for quality of content
- not proof reading the proposal or not even using spell check
- vague references to expected outcomes or procedures to obtain data
- not following directions

Even special earmarked funds, which NPL's are responsible for administering, will not be approved if the proposal is deficient.

USDA and Other Information

- **Grants**
 - The new procedures to follow when applying for grants, and release of grant information from CSREES, with application forms and deadlines, can be found at:
 - www.grants.gov, or
 - <http://www.csrees.usda.gov/fundingopportunities/requestforapplications>

- **Portfolio Evaluation**

- CSREES has chosen to review our portfolio of programs to justify our budget requests

- Annual Update

- Management and Production
- Animal Health and Welfare

Internal Committees

Diversity Committee

Meetings

US Poultry and Egg Association International Exposition

Southern Poultry Science Society (SPSS)

WERA-1902 organized a symposium "Proactive Approaches to Controversial Welfare and Ethical Concerns in Poultry Science" for the SPSS educational program

Future Trends in Animal Agriculture

– "Food Animal Agriculture in 2020"

Southern Region Poultry Extension Workshop (Triennial)

– Ken Anderson, Chair, 2009

National Poultry Waste Management Symposium

– Wanda Linker, Alabama Poultry Association

– It is essential for the success of this meeting to have reliable volunteers to head the different committees and reliable personnel to work on the committees.

– Contact Casey Ritz, University of Georgia to help on a 2008 committee

PSA National Extension Workshop

– Part of PSA Extension Committee

– Need Volunteers for the organizing Sub-Committee

– Start to prepare the program beginning in September/October

Projects

Animal Well-being Assessment

The Animal Behavior and Welfare Group (ABWG) at Michigan State University shares leadership with Purdue University the University of Wisconsin for the Animal Welfare Judging Contest for college level students.

Students evaluate live animals or

CD-based situations of farm animal

management and provide reasoning to judges

Goal is to include 4-H/FFA

In 2008 we will include veterinary student section

Diverse Voices In Agriculture

- Audience is USDA Personnel
- Gas stunning, CAST, CIWF, NAIA, high-tech. HACCP
- Animals' Angels
- Union of Concerned Scientists
 - Grass Fed Beef
- National Commission on Industrial Farm Animal Production

USDA Informal Animal Welfare Working Group

Audience is USDA Personnel

Stimulate discussion and provide opportunity to network

Quarterly meetings

• Distribution Lists

- animal rights/welfare, game birds, food safety, rabbit, and those related to the multi-state research projects
- no longer authorized to provide info. on agro-terrorism
- Contact me if you think an additional listing would be beneficial

American Poultry Historical Society

- Hall of Fame Award

• Nick Zimmermann,
University of Maryland

• PSA 2007 Tyson Foods Support Personnel Award

- Chet Utterback
University of Illinois

QUESTIONS?

Accountability for Administrators

Bobby Moser
The Ohio State University

Accountability for Administrators

Impacts with
IMPACT

Bobby D. Moser
VP for Agricultural Administration & Dean
The Ohio State University

The Culture ~ Way Back When

Reported: Who, What, When & Where

- Contacts made
- Meetings held
- Radio and/or newspaper contacts

The Culture ~ Today

It's all about the IMPACT

- Performance
- Accountability
- Focus
- Competitiveness

Defining "IMPACT"

IMPACT is...

The reportable and verifiable difference a program makes in the lives of people

Documenting CHANGE in:

- Knowledge, Attitudes, Skills, Aspirations
- Practice or Behavior
- Long Term Economic, Social, Environmental or Civic Conditions

It clearly states accomplishments and their payoff to society

Defining "IMPACT"

*"What **happened** as a result of the funding and related activities?"*

- Focus on the Impact
 - More than just data/information
- Describing what we do is not enough
 - Accountability (Impact reporting) is today's reality

Use of Impact Statements

- State and Federal Reporting
- Obtaining Legislative Funding
- Grant Proposals
- Faculty Promotion & Tenure
- Internal Accountability
- Stakeholders
- Media

Communicating the Impact

Legislature:

- Jobs
- Community/Economic Development
- Taking Innovations to Market

Communicating the Impact

Provosts, Presidents, Boards:

- Publications
- Grants (Indirect Costs)
- Commercialization of Research
- Success of Outreach Programs

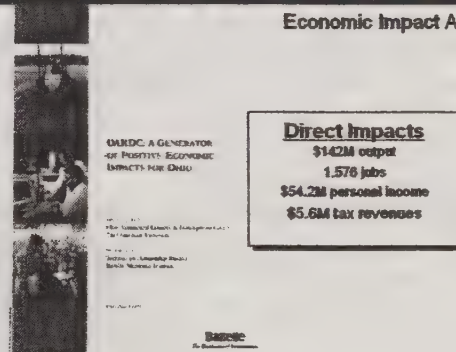
Communicating the Impact

Stakeholders:

- New Management Techniques
- Economic Impact
- Cost Savings
- Profit Enhancement

OARDC Battelle Report

Economic Impact Analysis



Research-Based Impact

Soybeans represented an \$837 million crop for Ohio in 2001 and covered 32% of all farmland

Situation

To maintain the viability of this industry, OARDC develops specific high-yield, disease-resistant, high-quality strains of soybean that thrive in Ohio

Input

To measure the impact of the OARDC on soybeans, Battelle produced an input/output model using data provided by OARDC cultivar releases

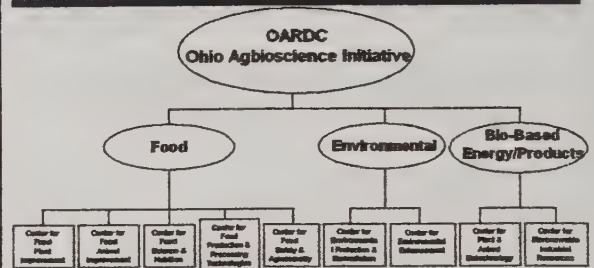
Output

The impact model shows that on an annual basis, OARDC soybeans generate:

- \$191 million in economic revenue
- Create \$67 million in income
- Support 4,838 jobs

IMPACT

Strategic Investments



OSUE Battelle Report

Economic Impact Analysis



OSUE's development work helps local governments and communities investigate/create viable options for economic and community development



A GENERATOR OF POSITIVE ECONOMIC IMPACT FOR OHIO



OSUE's development work helps local governments and communities investigate/create viable options for economic and community development

Direct Impacts

\$159M output
1,918 jobs
\$64M personal income
\$4.8M tax revenues

Battelle
The Business of Innovation

IMPACT Example:

Economic Development

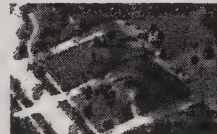
Some Ohio communities face great challenges in adjusting to current economic conditions

Situation

OSUE's development work helps local governments and communities investigate/create viable options for economic and community development

Input

Through OSUE's Ohio Business Retention & Expansion Initiative (BR&E), communities are provided resources, training and tools to pursue economic development actions and planning



Output

In Putnam County alone, this program encouraged a company with more than 2,000 employees to commit to staying in the community for at least 10 more years

IMPACT

Impact of a 1% Increase

Battelle calculated that a 1% increase in agricultural output in Ohio has the following impacts:

\$149 million in direct and indirect output

\$29 million in personal income generated for Ohioans

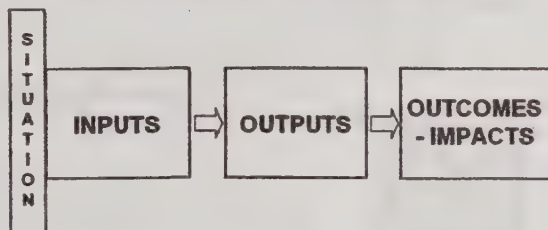
2,712 jobs created

OSUE Strategic Themes

- 1) Growing Green Industry & Agriculture
- 2) Enhancing the Natural Environment
- 3) Creating Jobs Through Entrepreneurial/Value-Added Strategies
- 4) Enhancing Educational Capacity
- 5) Strengthening Communities, Neighborhoods & Families
- 6) Enhancing Food & Health
- 7) Creating Rural/Urban Interface Opportunities

The Logic Model

Planning and Reporting at The Ohio State University



The Logic Model

Planning and Reporting at The Ohio State University

Unified Reporting System (URS)

- Describe the situation for programming, then report Inputs, Outputs and Outcomes (Impact)
- While impact cannot be documented for every program every year, the objective is to document impact as much as possible
- Also used in Performance Appraisal processes to ensure input accountability

OARDC Performance Model

- Documented Impacts of Research
- Grants
- Patents & Licenses
- Overhead (Facilities & Administration)
- Peer Reviewed Publications
- Non-Peer Reviewed Publications/Products
- MS and PhD Degrees Conferred

OSUE Performance Model

- Major Programs and Documented Impact
- Faculty/Staff Providing Leadership
- New Funding Leveraged
- Communications & Partnerships
- Training Volunteers & Educators
- Forecast Programmatic Trending

Academic Programs Performance Model

Revenue – Costs = Annual Allocation

Costs

- Personnel salaries & benefits
- Graduate student support
- Operating funds
- Plant Operation & Maintenance (POM)
- Central taxes (Provost & Student Services)
- Assessments

Revenues

- Credit hours taught generate
 - ✓ Tuition
 - ✓ State subsidy
- Indirect cost returns

IMPACT Example:

Computer Model for Optimizing Cooling in Dairy Cows

The economic loss to the US livestock industries as a result of heat stress is estimated at \$2.5 billion per year

Situation

Our research quantified the economics of methods to mitigate heat stress and a wide range of other management alterations

Input

Developed a full day extension module that is used throughout the nation to optimize cooling systems in dairy

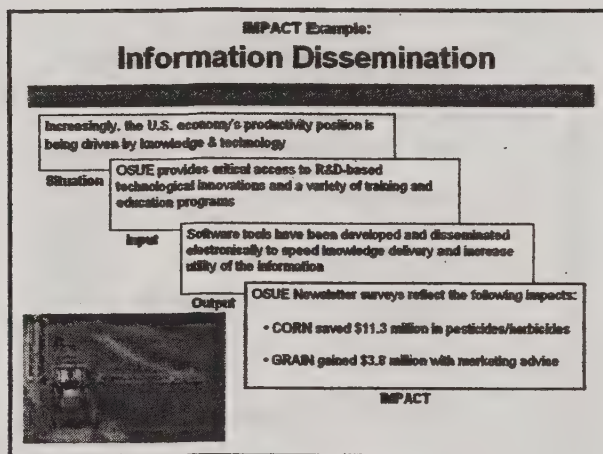
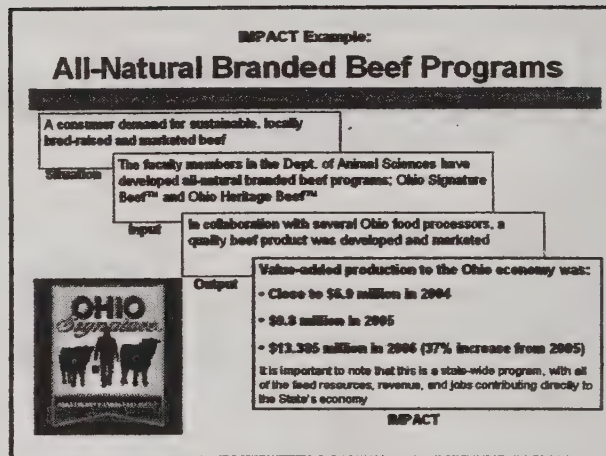
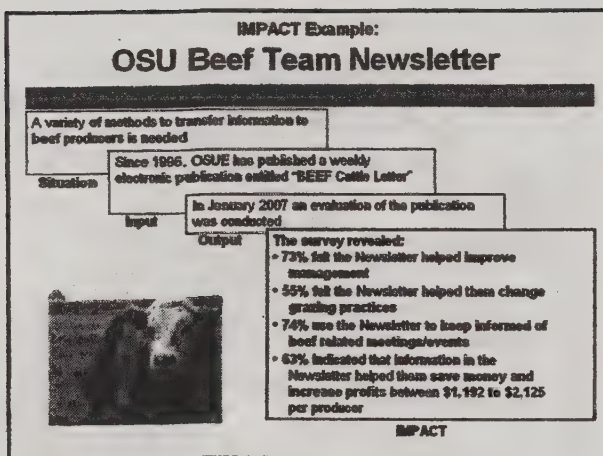
Output

Our system generates an additional:

- \$25/cow in annual net income or
- \$6.75 million per year to Ohio dairy farmers and
- \$227 million for US dairy producers

IMPACT





Conclusions

IMPACT REPORTING and accountability is today's reality ~ to ensure success now and into the future it is important that we embrace and:

- Recognize the value of reporting impacts
- Encourage the improvement of reporting habits
- Develop the skills to effectively articulate impacts

Future resources (and success) depend on faculty's disciplined efforts to provide clear and concise IMPACT reporting

Accountability for Administrators

Impacts with IMPACT

Bobby D. Moser
VP for Agricultural Administration & Dean
The Ohio State University

How to Lessen the Pain of Reporting: Multiple Uses for the Same Information

John Carey
Texas A&M University

Lessening The Pain Of Reporting

John B. Carey
Interim Dept. Head
Poultry Science Dept.
Texas A&M University

Lessen the Pain

- Don't Consider It a Pain
 - Make it work for you
- Being organized allows the process to serve your needs as well as those you report to.

Simplify Things

- Keep program areas to a minimum
 - Three should be adequate for most specialists

Quality of Data is Important

- Collection, recording and storing of day to day data is essential
 - Log of phone calls, office contacts, anything that does not leave an electronic footprint.
 - Use data that email and calendar produce as a source of raw data.
 - Collect Web based contacts

Evaluate Impacts

- Measure the Impact at Every Event
 - Not Tedious or Expensive
 - Basic – Simple Assessment is Best
- Being Able to Articulate and Document Program Impacts is Critical.

Periodic Narrative Reports

- Use Data Collected by Previous Methods
 - Opportunity to Update Core Document
 - Sweep Together Data Collected
- Second to Core Document in Importance.

Update Your Core Document Frequently

- Do it When Things Happen
 - Publication Submitted or Accepted
 - Grant Submitted or Approved
 - Award Received
- Waiting Will Result in Unnecessary Work for Retrieval of Information
 - Something Will Get Forgotten or Recorded Wrong

Your Core Document

- The "Home Base" for all Information
 - The Main Dossier for P&T
 - Treasure Chest of Information
- A Current Core Document Can Be Used to Produce Almost Any Report.
 - If it is up to Date Then the Process is Much More Efficient.

Let's Review

- Keep Things Simple
- Collect Data on a Real-Time Basis
- Produce Narrative and Statistical Reports Frequently

Let's Review

- Feed This Periodic Data Into Your Core Document
- Use Your Core Document as the Repository of all Knowledge
- Extract Information for the Core Document for Summary Reports

Let's Review


- Make it Useful to you – For Your Benefit.

Questions?



What Information do I Need to Keep Extension Funded


James Wade
NASULGC



NASULGC National Association of State Universities and Land-Grant Colleges

What information do I need to keep Extension funded?


James C. Wade, Ph.D.
Director, Extension and Outreach
NASULGC: A Public University Association



NASULGC National Association of State Universities and Land-Grant Colleges

National Association of State Universities and Land-Grant Colleges


- Presidential Association
- Longest serving Association in American Higher Education
- Member universities represent
 - 3.8 Million Students Enrolled
 - 25 Million Alumni



NASULGC National Association of State Universities and Land-Grant Colleges

Who We Are

- 215 State and Land-Grant Universities
- 79 Land-Grant Universities
 - 61 States, Territories and DC
 - 18 Historically Black Land-Grants
 - Native American Institutions



NASULGC National Association of State Universities and Land-Grant Colleges

Land-Grant Universities

- 1862 Morrill Act
 - Agriculture
 - Mechanical Arts
 - Military Science

Legislation Expanded Efforts

- 1890 Morrill Act
- 1887 Hatch Act
 - Agricultural Experiment Stations (Research)
- 1914 Smith–Lever Act
 - Cooperative Extension Service
- 1994 Native American Institutions

Focus of Land-Grant Universities

- Learning
- Discovery
- Engagement



Extending Research-based Knowledge

- Engagement and Cooperative Extension
 - Linked to University Research
 - Over 3,000 County Offices
- USDA – Historic and Ongoing Linkages
- Many Other Agencies and Groups

Cooperative Extension

- Cooperative is Intentional!
- Non-formal, non-credit learning
- Community-based
 - Learning community often engaged in the development of the learning process



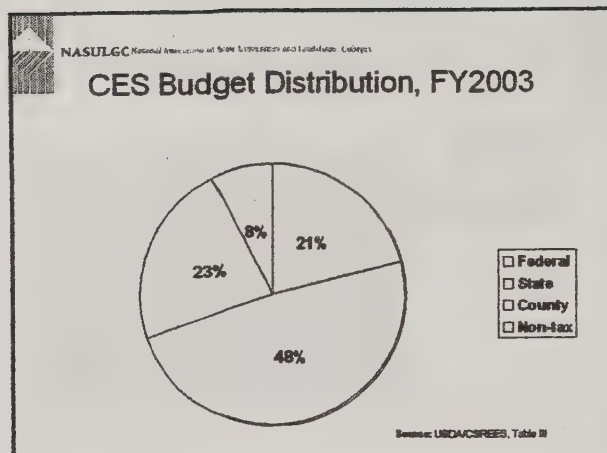
Cooperative Extension

- Often first responders in education
- Deploying knowledge to user communities
- Applied research with users
- Most programs at no or minimal cost



Partnerships and Funding

- States through the Land-Grant Universities
- Local Governments – Counties and Cities
- Federal
 - USDA
 - Cooperative States Research, Education, and Extension Service (CSREES)
 - Other Agencies – Grants
- Private Partnerships
 - Foundations, Associations, Participant Fees and Other



- NASULGC National Association of State Universities and Land-Grant Colleges
- ### CES USDA Formula Funds
- Smith-Level 3 (b) & (c)
 - Section 1444
 - Smith-Lever 3(d)
 - EFNEP
 - RREA – Renewable Resources Education Act
 - 406 Accounts

- NASULGC National Association of State Universities and Land-Grant Colleges
- ### Other USDA/CSREES
- National Research Initiative (NRI)
 - Integrated Accounts (22%)
 - Improve CES participation
 - CES led Proposals
 - Panel Reviewers
 - New Technologies for Ag Extension
 - eXtension

- NASULGC National Association of State Universities and Land-Grant Colleges
- ### Federal Funding Process
- Authorization – Farm Bill
 - Research and Education Title
 - Congress
 - Appropriations – Annual Budget Process
 - Agencies/Administration Proposes
 - Congress Disposes

- NASULGC National Association of State Universities and Land-Grant Colleges
- ### Board on Agriculture Assembly
- Farm Bill/CREATE-21 Task Force
 - Cornerstone Government Affairs
 - Inputs from teaching, research, extension, international and others
 - Budget and Advocacy Committee
 - FY08
 - FY09
 - Collecting priorities for discussion from all above

- NASULGC National Association of State Universities and Land-Grant Colleges
- ### Farm Bill
- Due for reauthorization in 2007
 - Underway
 - May or may not happen
 - Research and Education Title
 - CREATE-21
 - Other Proposals

Annual Appropriations Funding

- FY07 Funding
 - “Earmarks” – Funds placed in base/capacity
- FY08 Funding
 - Start with FY07 Funding
 - Set priorities from Sections
 - Advocate for funding

How are CES priorities set?

- CES leadership is polled
- CES consensus is reached
- Combined with other Sections
- Priorities set for the “system”
 - All Sections advocate for the “system”

Impact Advocacy

- All advocacy is “local”
- Advocacy groups always need examples with high impact
 - NASULGC process
 - Paid advocacy/communication firm (s)
 - USDA/CSREES
 - Soybean Rural Response
 - Extension Disaster Education Network (EDEN)



CES Program Priorities Process


- Use in Advocating for Federal Budget Priorities
- Inform CSREES NPL's regarding priorities for the NRI (integrated accounts)
- Inform selection of eXtension CoP's

Opportunity Areas (DRAFT)


- Create pathways to energy independence.
- Assist communities in becoming sustainable and resilient to the uncertainties of economics, weather, health and security.
- Help U.S. residents to be physically, mentally, and emotionally healthy.
- Assure an abundant and safe food supply for all.
- Sustain profitable plant and animal production systems.
- Prepare youth, families, and individuals for success in the global workforce and all aspects of life.
- Assist in effective decision-making regarding environmental stewardship.




- 24/7/365 Cooperative Extension
 - Educational Resources
 - Frequently Asked Questions
 - Ask the Expert
- <http://www.eXtension.org>

 **NASULGC** National Association of State Universities and Land-Grant Colleges

eXtension Communities of Practice (CoPs)



more than just reach

- Beef Cattle
- Consumer Horticulture
- Corn and Soybean Production
- Cotton
- DAIReXNET
- Diversity Across Higher Education
- Entrepreneurs and Their Communities
- Extension Disaster Education Network
- Family Caregiving
- Financial Security for All
- HorseQuest
- Imported Fire Ants
- Just in Time Parenting
- Livestock and Poultry Environmental Learning Center
- Map@Syst
- Pesticide Environmental Stewardship
- Pork Information
- Urban Integrated Pest Management
- Wildlife Damage Management
- Youth SET for Life
- eOrganic

 **NASULGC** National Association of State Universities and Land-Grant Colleges


What Can You Do?

- Be knowledgeable of CES funding processes.
- Recognize that big picture is beyond individual project or individual client goals.
 - Base/Capacity Funding
 - Competitive Funding

 **NASULGC** National Association of State Universities and Land-Grant Colleges


Base/Capacity Funding

- Support CES administrations' efforts to increase funding for base/capacity funding.
 - Professional Associations


 **NASULGC** National Association of State Universities and Land-Grant Colleges

Competitive Funding

- Support competitive initiatives like NRI.
 - Work with CSREES National Program Leaders (NPL)
 - Goals of a competitive program may be targeted.

 **NASULGC** National Association of State Universities and Land-Grant Colleges

Questions?

 **NASULGC** National Association of State Universities and Land-Grant Colleges

NASULGC: A Public University Association

National Association of State Universities
and Land-Grant Colleges
1307 New York Ave, NW
Washington, DC 20005

<http://www.nasulgc.org>

How Plans of Work and Annual Reports are Used at the Federal Level

Bart Hewitt
USDA/CSREES

How Plans of Work and Annual Reports are Used at the Federal Level

Joint ASAS/ADSA/PSA Extension
Workshop:
Accountability Issues in Extension:
Identifying, Measuring and Reporting
Impacts

Bart Hewitt, Accountability and Reporting Leader

July 10, 2007



Plan of Work – A Short History

- Development began January 2004
- Proposed Guidelines Published June 2005
- Final Guidelines Published January 2006
- 2007-2011 Plan of Work submitted June 2006
- 2008-2012 Plan of Work Update April 2007
- 2009-2013 Plan of Work Update April 2008
- 2007 Annual Report April 2008



Plan of Work Goals

Why do we have a new Plan of Work Electronic System?

- Responds to AREERA
- Opportunity to reduce reporting burden over time
- **Maximize usefulness of Information**
- Improve Plan of Work accountability
- Meet requirements of
 - Program management
 - OMB and USDA
 - Congress



Plan of Work – Benefits

- Reduced reporting burden on institutions
- Easier for Partners to review what other states are doing (POWs are Published in REEIS)
- Easier for both Partners and CSREES to identify performance measures & track progress with structured format
- States will receive better and more timely feedback on their Plan of Work and Annual Report from CSREES
- Supporting documentation for Internal and External Requirements
- To produce the Plan of Work Summary Document

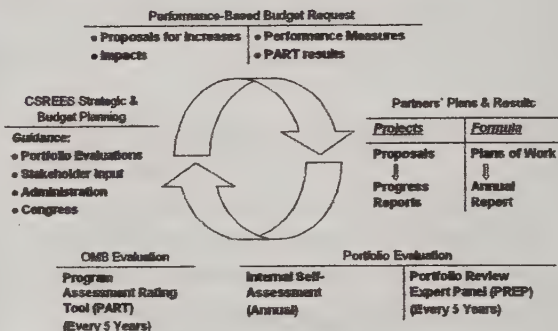


Plan of Work and Annual Report Data Use

- How will CSREES use the information from the Annual Report for planning and accountability?
 - State Plan of Work Accountability
 - **Portfolio Reviews**
 - OMB PART process
 - **Budget Performance Integration**
 - GAO and OIG inquiries
 - Answer Congressional & Departmental inquiries
- Brings greater visibility of successes of Formula Funded Programs



Budget-Performance Cycle



The Portfolio Review Expert Panel (PREP) Process

- OMB PART/PMA BPI led to development of new portfolio assessment tool and measures
- Uses OMB R&D criteria (relevance, quality, and performance)
- Portfolio analysis used to assess progress toward goals and guide announcements for grants



The PREP Process (cont'd)

- Focuses on Outcomes rather than processes
- Level of analysis is a portfolio identified via KAs
- Expert Panels score portfolio progress and provide recommendations for CSREES
- Expert panelists are asked to systematically assess distinct dimensions of the three OMB R&D criteria. The scoring process is standardized across portfolios, therefore, able to provide quantitative assessment of portfolios



R&D Criteria Dimensions

Relevance:

- Scope
- Focus
- Contemporary/emerging issues
- Integration
- Multi-discipline balance

Quality:

- Significance of findings
- Stakeholder inputs
- Alignment with current state of science
- Appropriate/cutting edge methodology

Performance:

- Portfolio productivity
- Portfolio comprehensiveness
- Portfolio timeliness
- Agency guidance
- Portfolio accountability



Number of Portfolios Assessed

1. Agricultural markets and trade
2. International economic development
3. Agricultural and food processing / bio-based products
4. Structures of the agricultural sector and farm management
5. Plant production
6. Animal production
7. Expand economic opportunities through economic and business decision-making
8. Informed decisions affecting quality of life in rural areas
9. Food safety
10. Plant protection
11. Animal protection
12. Nutrition
13. Forest and rangelands
14. Soil, air, and water



Phases of the PREP Process

1. Identify/Select Expert Panels
2. Develop Self-Study Report
3. Compile Evidentiary Materials
4. Self-Score Prior to Panel Meeting
5. Convene Expert Panels
6. Oral Presentations to Panels
7. Panel Exit Debriefing
8. Annual Internal Self-Study



1. Identify and Select Expert Panels

- Potential panelists' names were suggested by Deputy Administrators and NPLs.
- Selection of high-level panelists with broad experience in topic area after careful reviews for absence of conflict of interest. Panel membership included: University Vice-presidents, Deans/Associate Deans; Industry experts (company vice presidents, etc.); Evaluation Experts, and Experts from other federal agencies.



2. Develop Self-Study Reports

- NPLs search CRIS, review plans of work, annual reports, and termination reports to search for nuggets of important information (e.g. success stories, etc.) to present in self-study reports



3. Compile Evidentiary Materials

- NPLs compile materials submitted or published by partners (e.g. newsletters, project descriptions, publications, printed materials, etc.) and make them available to panels for inspection during panel deliberations
- NPLs may have called partners for additional materials to be included in the evidence



4. Self-Score

- Based on self-studies and evidentiary materials, NPL teams self-score using a score sheet.
- The score sheet was based on OMB R&D Investment Criteria: quality, relevance, and performance.



5. Convene Expert Panels

- Panels meet in Washington for 2.5 days
- Day 1 = Orientation and oral presentations by NPLs
- Day 2 = Deliberations and scoring
- Day 3 = Finalizing scores and draft panel reports; providing exit interviews



6. Oral Presentations to Panels

- NPLs focus on partners' work (beyond self-study reports) in oral presentations to panels



7. Panel Exit Debriefing

- Panel prepared for Debriefing and drafted Panel Report
- Panel provided Debriefing to CSREES
- Panel commented on the portfolio based on their deliberations and discussed recommendations
- Panel provided portfolio scores
- Q/A



8. Annual Self-Studies

- Portfolio self-studies are conducted internally every year by NPLs
- Report on implementations of panel recommendations for the year
- Report on new changes/improvements in portfolios
- Self-score annual self-studies by NPLs



Representative Comments by Experts in Reports on PREP...

- "The panel was disappointed with the evidence provided..."
- "The portfolio failed to present a complete picture of all the inputs, outputs and outcomes."
- "There is a strong need to improve accountability showing measurable impacts, not just in CSREES, but throughout the system and down to individual investigators."



Improved POW System is Raising Panelists' Expectations

- "... *Plan of Work* and *One Solution* are expected to improve the documentation of significant findings."
- "In 5 years, [the panel] expects to see the consistent information across knowledge areas necessary to evaluate the portfolio properly."



Expectations of Panelists for CSREES OPA and NPLs

- CSREES OPA will work "...to improve data collection, performance measurement and reporting."
- "CSREES and NPLs should have better communication with state partners in order to get significant evidence of outputs and impacts."

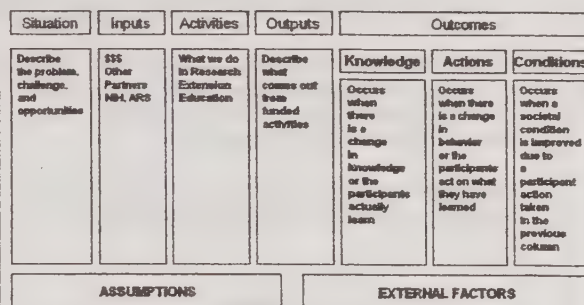


Further Comments

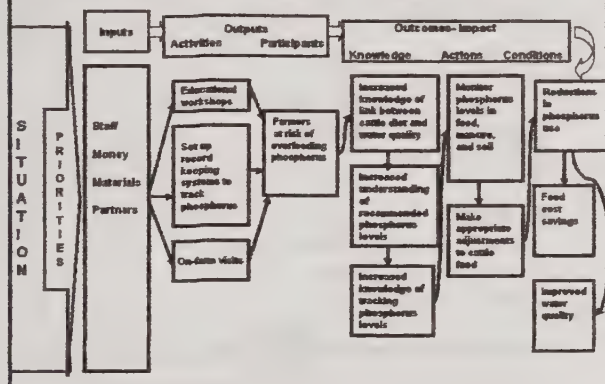
- Need more details and discussion on extension outcomes —more details, more outcome examples based upon extension activities. Need documentation of specific results achieved by these activities.
- Use of logic models



CSREES Logic Model as "Roadmap"



Water Quality Program: Logic Model



What is being done at CSREES?

- CIS (One Solution Initiative)
- Redesign CRIS report to make it possible to report extension budget figures
- Build POW and standardize annual reports to make it easy for partners to report outcomes following a logic model format
- Develop management dashboard to enable the Agency to search for outcomes submitted in annual reports



What has been implemented in various Units (as responses to comments/recommendations)?

- Activities in the Natural Resource Unit — retreat for planning; hiring an NPL for needed areas as identified by the panel, etc.
- Activities in the Animal System — retreat for road map development, etc.
- Activities in the Plant System — hiring an NPL for needed area as identified by the panel, etc.
- Activities in Family, 4H, and Nutrition Unit —retreat for planning, etc.



Summary

- Using the PREP process, CSREES has convened external panels to assess 14 portfolios, supporting all five Agency strategic goals.
- The PREP process provides opportunities to solidify CSREES-institution partnerships
- Panelists have provided comments & recommendations useful for CSREES to improve upon program management and communications with partners — benefiting both partners.

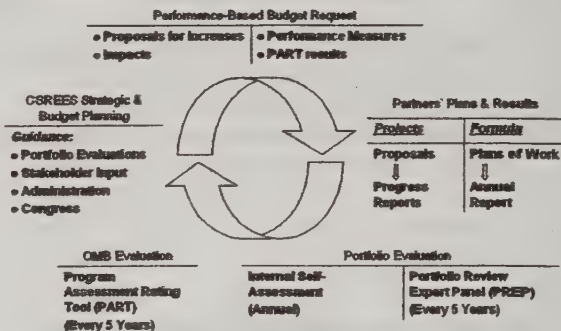


Summary (cont'd)

- CSREES has been responding to panel comments and recommendations to improve upon the way to do business – building the new POW, standardizing annual reports, CIS (One Solution), etc.
- April 2008 – First Annual Report of Accomplishments from the new On-line State Plan of Work system.



Budget-Performance Cycle



The screenshot shows the 'About Us' section of the CSREES OPA Web Pages. It includes a navigation menu on the left with links like 'Home', 'About Us', 'Strategic Planning', 'Accountability', 'Information', 'Contact Us', and 'Links'. The main content area is titled 'About Us' and contains text about the Cooperative State Research, Education, and Extension Service. It also includes a section for 'Strategic Planning and Accountability' and a list of 'Partners'.

For Further Information

- Bob MacDonald
Director, Office of Planning and Accountability
rmacdonald@csrees.usda.gov
(202) 720-5623
- Bart Hewitt
Accountability and Reporting Leader
bhewitt@csrees.usda.gov
(202) 720-0747



JOINT EXTENSION SYMPOSIUM (PART 2)

**THEME: Changing the Future of Food Animal
Production**

Welcome/Introduction

Richard Stup
The Pennsylvania State University

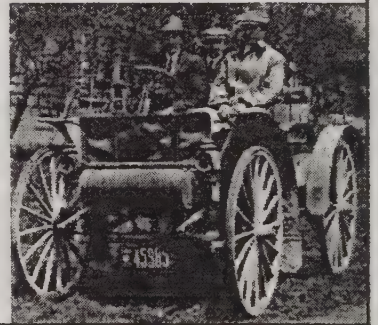
The Lengthening Chain of Change



Richard E. Stup, Ph.D.
Penn State Dairy Alliance
RichStup@psu.edu

Extension Pioneer

A.B. Ross, the country's first county extension agent, is shown behind the wheel in his home territory of Bedford County. His passengers are also historic figures: (front seat) R.L. Watts, dean of Penn State's College of Agriculture in the early 1900s and (rear) Milton McDowell, the second director of extension in Pennsylvania.



Classic Extension Work

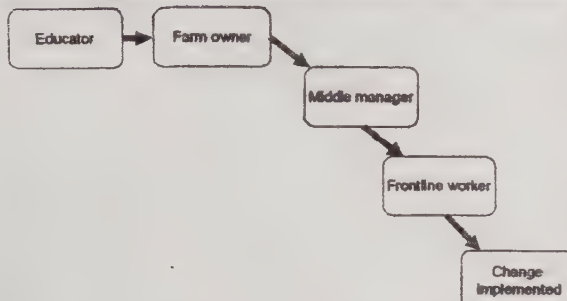


(Painting by Norman Rockwell, 1948)

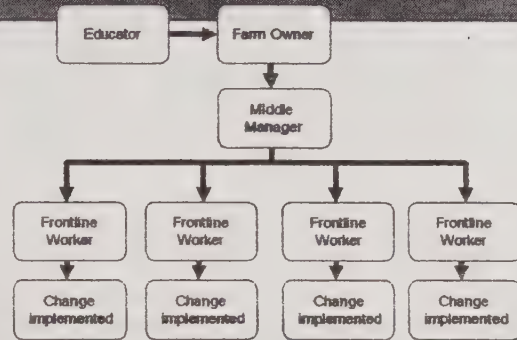
Historic Chain of Change



Modern Chain of Change



Modern, Complex Chain of Change



Real World Example: Estrus Synchronization

- Lack of compliance with hormone injection protocols is the main reason for failure with estrus synchronization (Fricke & Stewart, 2005)



Field of Change Management

- Organization Development (OD)
- Donald Kirkpatrick: empathy, communication, participation
- John Kotter
 1. Increase urgency to get people motivated to change.
 2. Build the guiding team of people to lead the change.
 3. Get the vision right.
 4. Communicate with the rest of the organization for buy-in.
 5. Empower action, find ways for people to act on the vision.
 6. Create short-term wins so that momentum can build.
 7. Don't let up, keep change coming in waves.
 8. Make change stick by institutionalizing the new behaviors.

Challenge and Opportunity

- *"People change what they do less because they are given analysis that shifts their thinking than because they are shown a truth that influences their feelings"* (Kotter, 2002, p. 1)
- Change management expertise is sorely needed but rarely available. Opportunity for Extension to fill the void.

Change Management—How to Get Organizations to Change

Monty Hemenover
Avenues for Change

**CHANGE MANAGEMENT -
HOW TO GET ORGANIZATIONS
TO CHANGE**

PRESENTED BY:
MONTE L. HEMENOVER
AVENUES FOR CHANGE™
ST. LOUIS, MISSOURI

TO:
ATTENDEES OF THE JOINT NATIONAL EXTENSION
WORKSHOP SYMPOSIUM
ADSA/PSA-AMPA-ASAS 2007 JOINT ANNUAL MEETING

AT:
San Antonio, Texas
July 19, 2007

Avenues For Change

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Be
A Change Maker
Not
A Change Taker

Avenues For Change

U.S. Livestock Industry

**Will See More Change In Next 10 Years
Than Past 15 Years**

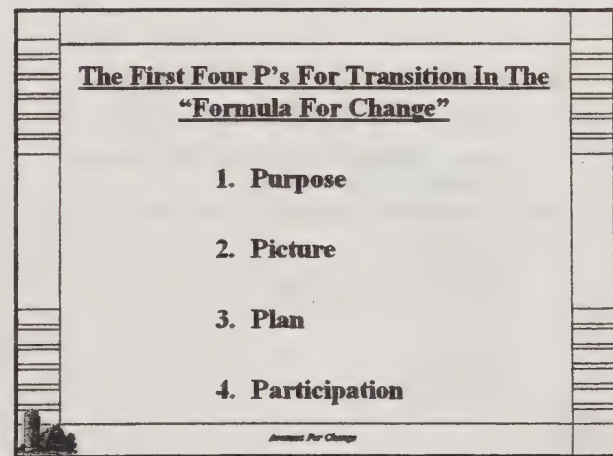
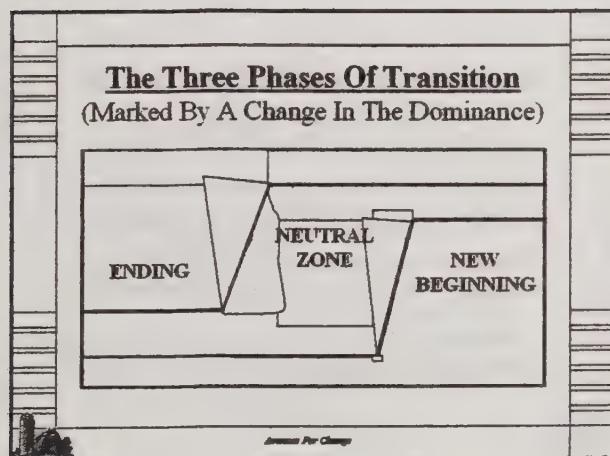
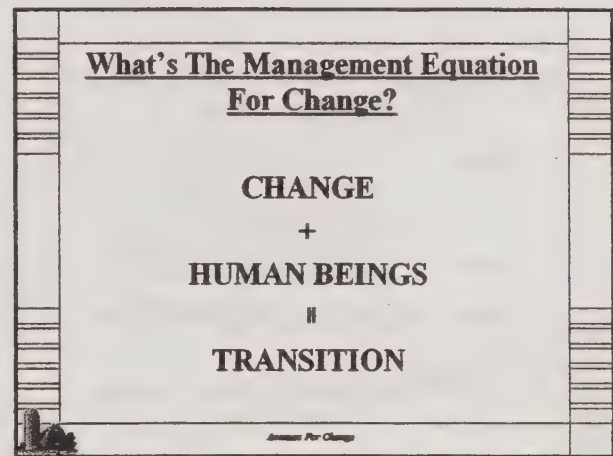
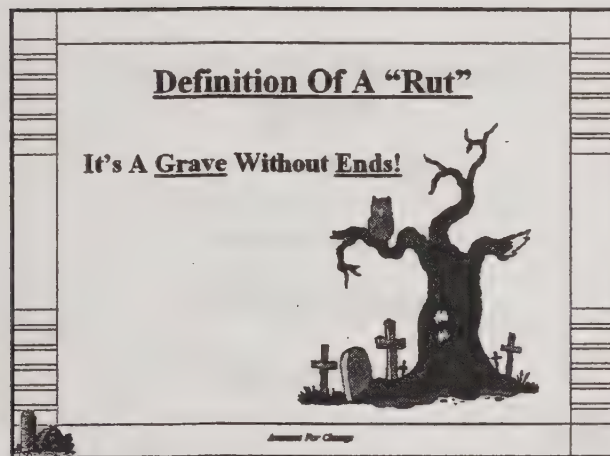
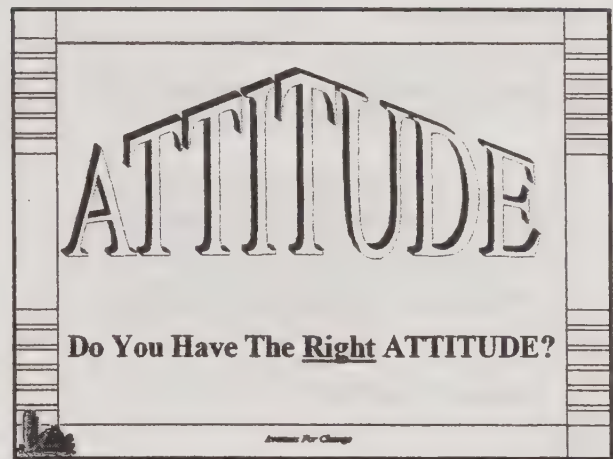
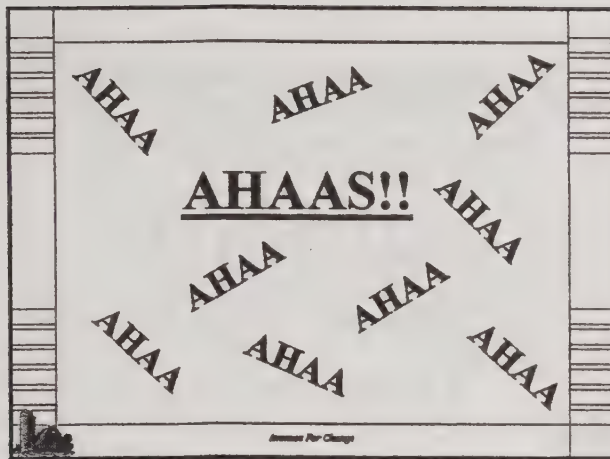
- Non-Agriculture Changes In The U.S. Will Have More Impact On Our Livestock Industry Than In The Past
- Global Changes Will Have Greater Impact On U.S. Agriculture And The Livestock Industry

Avenues For Change

**Critical “Outside” Events Shaping
The Future Of U.S. Livestock Industry**

• War/International Relationships	• Stock Market And Investments
• Global Weather	• Real Estate Values
• Energy Costs And Oil Supplies	• Unemployment, Welfare And Health Care Costs
• Economic Strength Of Countries	• World Population Growth
• Inflation And Interest Rates	• Availability Of Farm Labor
• Consumer Debt Crisis And Confidence	• Technology, Ag Policy And Regulations
• Global Agricultural Production	• Other Outside Events / Changes

Avenues For Change



The First Four P's For Transition In The "Formula For Change"

1. Purpose - Explains The Basic Outcome Sought
2. Picture - "PAINTS" A Picture Of How Outcome Will Look And Feel Before Gaining Commitment
3. Plan - Step By Step Plan For "Phasing In" The Outcome - It's An Idea Of How To Get Where You Need To Go
4. Participation - Gives Everyone Involved A Role In Both The Plan And The Outcome

Investment Per Change

The Second Four P's For Transition In The "Formula For Change"

5. Process
6. Practice
7. Patience
8. Performance & Profit

Investment Per Change

The Second Four P's For Transition In The "Formula For Change"

5. Process - Confirmation By A "Walk Thru" Of How The Transition Will Occur And Any Modifications That Need To Be Made By The Responsible Persons
6. Practice - Participants Do Multiple "Walk-Through's" Of The Process To Insure Success
7. Patience - Allow Participants Executing The Transition To Work Out The "Bugs"
8. Performance & Profit - Measurement Of Outcomes / Results With The Responsible Persons

Investment Per Change

Change Profiles In A Livestock Business

- Change Leaders
- Change Navigators
- Change Sympathizers
- Change Resisters

Investment Per Change

You Need To Adopt The Right Thinking Process

- Thinking Is Like Golf, Not Just The Quantity Of Practice, It's The Quality
- The "Thinking" Process
 - Gathering
 - Analyzing
 - Prioritizing
 - Planning
 - Imaging
 - Executing
 - Reflecting

Investment Per Change

Adopt The Right Thinking Process

- Gathering - Data And Information That Provides Insight
- Analyzing - Breaking Down Into Component Parts
- Prioritizing - Choosing What Or Who To Focus On First
- Planning - Create A Step-By-Step Series Of Actions
- Imaging - Seeing In Your Mind's Eye And Practicing Mentally
- Executing - Make It Happen!
- Reflecting - What Went Right / Wrong And What To Do Differently Next Time

Investment Per Change

What Is The Number One Goal Of Any Business?

SURVIVAL!

Armen Per Chang

Survival

**It's not the strongest of a
species that will survive, nor
the most intelligent; but the
most adaptable to change.**

— Charles Darwin

Armen Per Chang

Steps To A Successful Livestock Business

- Survival
- Optimization
- Growth / Expansion

Armen Per Chang

Defining Today's U.S. Livestock Producer

1. Exiting
2. Status Quo
3. Modest Expansion
4. Aggressive Expansion

Armen Per Chang

The View Of Today's U.S. Livestock Producer

Exiting: No Opportunity, Stage In Life, Urban Sprawl, Regulations

Status Quo: Satisfied, No Risk, Ride It Out, Sell In Future, Can't Expand

Modest Expansion: Increase Profitability, Economies Of Scale, Next Generation Needs

Aggressive Expansion: Rapid Increase In Profitability, Greater Economies Of Scale, Great Next Generation Needs

Armen Per Chang

A Successful Livestock Business Must Have Two Forms Of Leadership

1. Visionary - Doing The Right Thing
2. Execution - Doing Things Right

Armen Per Chang

**Summary Messages For You And
Managing Change**

- Attitude
- Manage Change Through Transition
- Use The Eight P's
- Use A "Sound" Thinking Process
- Take "Advantage" Of Change As Disguised Opportunities
- Stay Informed And Challenged
- Use Outside Resources
- Focus On Improving Business Performance (Profitability)

Avenues For Change

**CHANGE WILL HAPPEN
SUCCESS IS OPTIONAL!**

Avenues For Change

**"Madness Is Defined As A
Person Who Does The
Same Thing Everyday ...**

**... And Expects Different
Results"**

-- Albert Einstein

Avenues For Change

**The End
Thank You!**

*Avenues For Change™
Monte L. Hemenover*

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(314) 432-7000 Office
(314) 409-4860 Cell
(314) 432-7081 Fax

Avenues For Change

Panel: Adapting Extension to Rapidly Changing Industries

Todd See
North Carolina State University

Adapting Extension Programs to a Rapidly Changing Industry: A Pork Industry Experience

M. Todd See

Professor & Extension Swine Commodity Coordinator
North Carolina State University



Outline

- ☐ Prologue
- ☐ Rapid Change
- ☐ Adaptation of Extension Programs
 - State
 - County
- ☐ Future



A Shared Vision

"The Midwest is largely ignoring North Carolina as a pork producing state. I hope they continue to ignore us. Then one day they will wake up and realize that North Carolina has become the No. 1 pork producing state in the nation."

Dr. Ira Porterfield, Head of Animal Science, NCSU
As reported in The News and Observer January 8th, 1965



"Tobacco acreage will be reduced 19 1/2 percent this year. We need to find ways to make up this loss of income. Pork production will be given major emphasis in 1965 as an alternative source of income."

Dr. Ira Porterfield, Head of Animal Science, NCSU
As reported in The News and Observer January 8th, 1965



A Coordinated Effort to Increase NC Pork Production

- ❑ North Carolina State University
- ❑ North Carolina Dept. of Agriculture
- ❑ North Carolina Farm Bureau
- ❑ Allied industries
 - Wachovia Bank
 - Southern Railways
 - Frosty Morn Meats
 - Smithfield
 - Gwaltney
 - North Carolina Pork Producers Association



1961 NC Swine Evaluation Station



Initiatives

- ❑ 1963 - NC became the first state with a mandatory swine check-off program (\$0.05 / head)
- ❑ 1963 - Extension agents in 62 counties designated as livestock agents and assigned specific swine responsibility
- ❑ 1964 - Area Extension Swine Program begun
- ❑ 1964 - On-farm performance testing program initiated



1964 NC Swine Development Center



"I see no reason why, within two years, livestock couldn't contribute as much to our total farm economy as tobacco"

Dr. H. Brooks James, Dean of Agriculture, NCSU
As reported in The News and Observer March 11th, 1965

"...a symbol of the opportunities all of North Carolina has to increase income from swine and other livestock."

Wayne Corpering, farm aide to NC Gov. Dan Moore
As reported in The News and Observer March 11th, 1965



"The Upper Coastal Plains Research Station near Rocky Mount, represents the last word in recommended practices and management in making pork. It is a joint development project of the NCSU and the NCDA. It explores new ideas in every phase of swine production, . . . and serves a training center. The objective is to bring prosperity to the eastern part of the state."

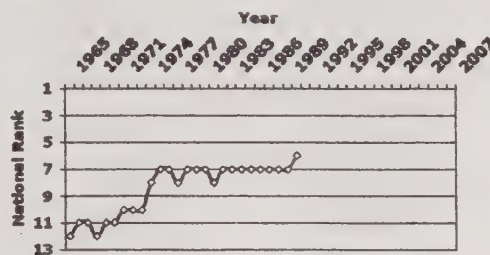
Jean Harris, Food Editor
As reported in The News and Observer December 28th, 1972



1982 NCSU Swine Extension Team



North Carolina's National Rank in Swine Production

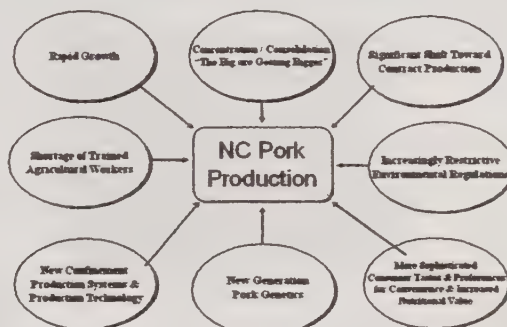


"The question remains, why has NC experienced these increases in pork production not experienced by states much closer to the heart of the corn belt that supposedly enjoyed natural advantages in pork production?"

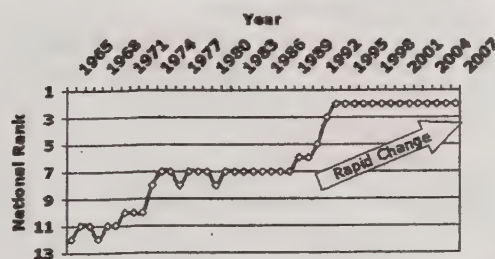
The answer is that the conditions were right, but we had and continue to have a coordinated program, a team approach and total involvement."

Dr. James R. (Bob) Jones, Extension Swine Specialist, 1978

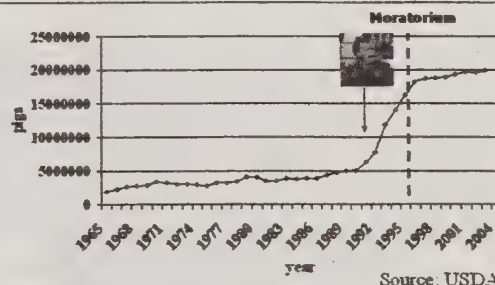
Rapid Change in NC Pork Production 1990 to 2007



North Carolina's National Rank in Swine Production

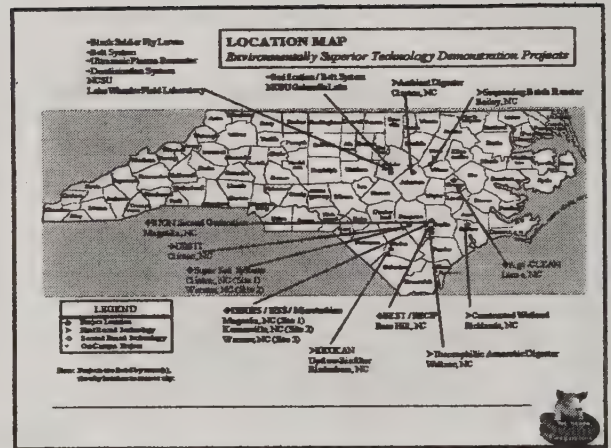


North Carolina Pig Crop



Source: USDA

- ☐ 1992 HB 0200
 - Registration
- ☐ 1995 SB
 - Swine Farm Siting
- ☐ 1996 SB 1217
 - General Permits
 - Swine Farm Siting
 - Animal Waste Operators Certification
- ☐ 1997 HB 515
 - Moratorium on Production
- ☐ 1998 HB 418
 - Extended Moratorium
- ☐ 1999 Odor Rules for Animal Operations
- ☐ County Ordinances



Firm	Number of Sows
Murphy-Brown, LLC	995,325
Prestage Farms	140,000
Maxwell Foods	76,000
Coharie Farms	31,000
Coastal Plain	27,000
Garland Farm Supply	24,000
GIS/Perfect Pig	23,350
TDM - Hog Slat	23,000
L.L. Murphrey	20,500
J.C. Howard	18,000

Source: Successful Farming, 2006



A collage of four black and white photographs showing sheep in various settings. The top-left photo shows a sheep in a pen with a large wheel. The top-right photo shows sheep in a field with a fence. The bottom-left photo shows sheep in a field with a fence. The bottom-right photo shows a sheep in a pen.



- ☐ Technical Strength
- ☐ Basic, Applied and Field Research
- ☐ Universal Access to Information
- ☐ Responsive to Industry
- ☐ Collaboration
- ☐ Cooperation
- ☐ General Public Awareness

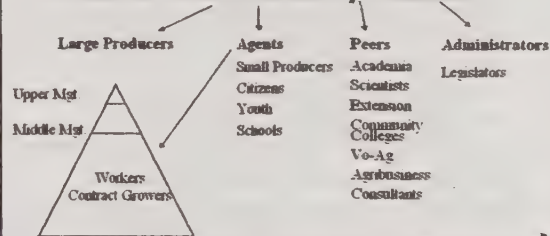


Campus Swine Extension Programs

- | | |
|--|--|
| <ul style="list-style-type: none"> <input type="checkbox"/> Animal Science <ul style="list-style-type: none"> ■ Todd See ■ Morgan Morrow ■ Eric van Heugten ■ Brian Faris ■ Chad Stahl (Aug. 1st) <input type="checkbox"/> Ag. and Resource Economics <ul style="list-style-type: none"> ■ Kelly Zering ■ Tom Vukina <input type="checkbox"/> Food Science <ul style="list-style-type: none"> ■ Dr. Dana Hanson | <ul style="list-style-type: none"> <input type="checkbox"/> Bio. and Ag. Engineering <ul style="list-style-type: none"> ■ Sanjay Shah ■ Mark Rice ■ Garry Grabow ■ Phil Westerman <input type="checkbox"/> Soil Science <ul style="list-style-type: none"> ■ Deanna Osmond ■ Karl Shaffer <input type="checkbox"/> Entomology <ul style="list-style-type: none"> ■ Mike Stringham ■ Wes Watson |
|--|--|



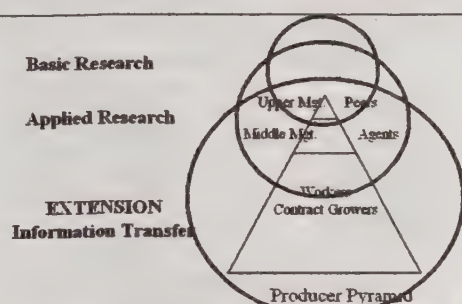
Extension Swine Husbandry Clientele



From: NCSU ESH Planning Retreat, 2000



Role of Extension Swine Husbandry



From: NCSU ESH Planning Retreat, 2000



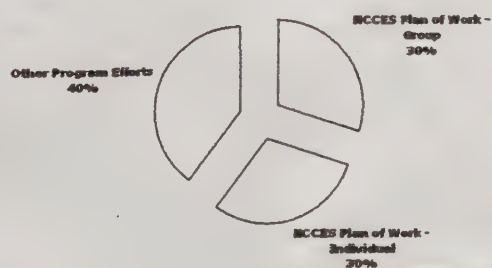
Action Points

- ☐ Written accomplishment reports
 - Annual Swine Report
- ☐ Identifiable logo
- ☐ Increase multidisciplinary programs
- ☐ Enhance quality of Swine News
- ☐ Information distribution via the Internet a priority
- ☐ Make all conferences "cutting edge"

From: NCSU ESH Planning Retreat, 2000



Extension Program Efforts % of Time Involvement per Extension FTE



From: NCSU ESH Planning Retreat, 2000



Cooperation



Monthly Newsletter

Thank Carolina Corporation Division (Inc.)
 Editor: [Name] - [Address]

SWINE News

Effect of Weaners and Old Sow on Pig Performance

The average piglet weaning age is 120 days. Pigs weaned at 120 days of age are 10% heavier than those weaned at 100 days of age. Pigs weaned at 100 days of age are 10% heavier than those weaned at 80 days of age. Pigs weaned at 80 days of age are 10% heavier than those weaned at 60 days of age. Pigs weaned at 60 days of age are 10% heavier than those weaned at 40 days of age. Pigs weaned at 40 days of age are 10% heavier than those weaned at 20 days of age. Pigs weaned at 20 days of age are 10% heavier than those weaned at 0 days of age.

mark.asci.ncsu.edu

NC STATE UNIVERSITY

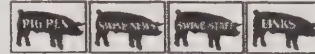


NC STATE UNIVERSITY Extension Swine Husbandry

MARK - Making Available Research-based Knowledge

This site is maintained by the Extension Swine Husbandry Staff in the Department of Animal Science - North Carolina State University to facilitate the rapid transfer of information to clients and colleagues.

Last updated February 2007



Look in the PIG PEDIA for Swine Information on:

Management, Reproduction, Genetics, Nutrition, Diseases, the Environment and More!

NC STATE UNIVERSITY
Pork Information Gateway

Click here to search for information and to answer questions. (powered by eXtension)

ncsu.porkgateway.org

NC STATE UNIVERSITY
Pork Information Gateway

SEARCH: [Text Box] [Submit]

LINKS: [List of links]

FEATURES: [List of features]

RESEARCH: [List of research topics]

EDUCATION: [List of educational resources]

MARKETING: [List of marketing information]

ENVIRONMENTAL: [List of environmental issues]

REPRODUCTION: [List of reproductive topics]

GENETICS: [List of genetic information]

HEALTH: [List of health issues]

CARE & WELFARE: [List of care and welfare topics]

SAFETY: [List of safety information]

BRANDING: [List of branding topics]

FEEDING: [List of feeding information]

MANAGEMENT: [List of management topics]

REPRODUCTION: [List of reproductive topics]

GENETICS: [List of genetic information]

HEALTH: [List of health issues]

CARE & WELFARE: [List of care and welfare topics]

SAFETY: [List of safety information]

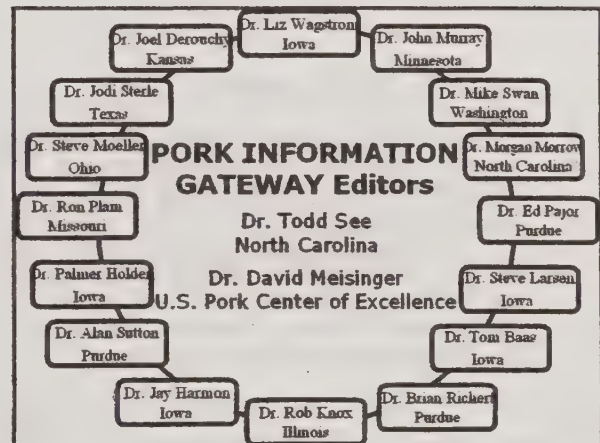
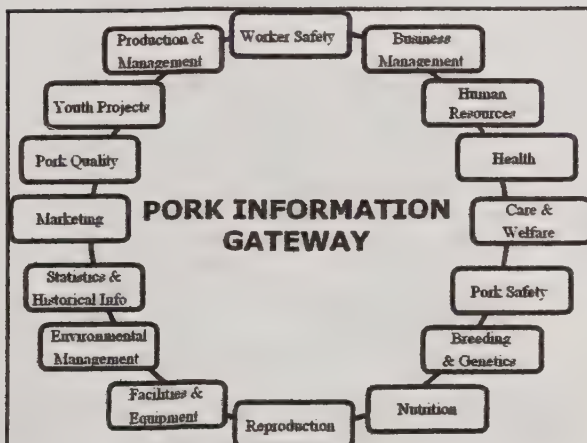
BRANDING: [List of branding topics]

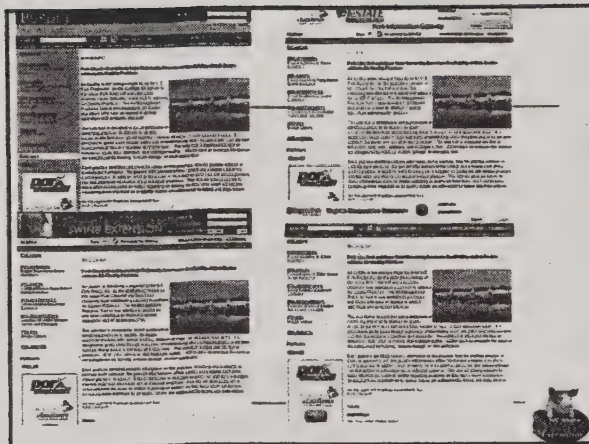
FEEDING: [List of feeding information]

MANAGEMENT: [List of management topics]

Pork Information Gateway

- Initiated in 2003 by partnership of Land Grant Universities and National Pork Board
- U.S. Pork Center of Excellence established July 2005
- P.I.G. Launched June 2006
- P.I.G. Accepted as eXtension COP Fall 2006





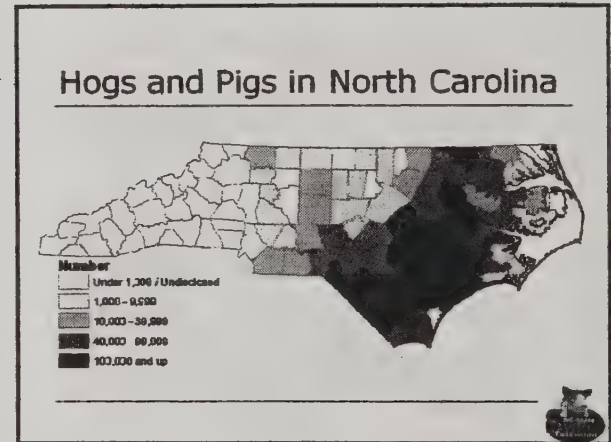
U.S. Pork Center of Excellence

Members

<input type="checkbox"/> National Pork Board	<input type="checkbox"/> North Carolina State University
<input type="checkbox"/> National Pork Producers Council	<input type="checkbox"/> Iowa State University
<input type="checkbox"/> USDA CSREES	<input type="checkbox"/> University of Tennessee
<input type="checkbox"/> USDA ARS	<input type="checkbox"/> Texas A&M University
<input type="checkbox"/> North Carolina Pork Council	<input type="checkbox"/> University of Missouri
<input type="checkbox"/> Mississippi Pork Producers Association	<input type="checkbox"/> North Dakota State University
<input type="checkbox"/> Tennessee Pork Producers Association	<input type="checkbox"/> Michigan State University
<input type="checkbox"/> Utah Pork Producers Association	<input type="checkbox"/> University of Wisconsin
<input type="checkbox"/> Missouri Pork Association	<input type="checkbox"/> Colorado State University
<input type="checkbox"/> Iowa Pork Producers Association	<input type="checkbox"/> University of Georgia
<input type="checkbox"/> Kentucky Pork Producers Association	<input type="checkbox"/> University of Arkansas
<input type="checkbox"/> Pennsylvania Pork Producers Council	<input type="checkbox"/> Ohio State University
<input type="checkbox"/> Wisconsin Pork Association	<input type="checkbox"/> Penn State University
<input type="checkbox"/> Illinois Pork Producers Association	<input type="checkbox"/> Purdue University
	<input type="checkbox"/> South Dakota State University
	<input type="checkbox"/> University of Illinois
	<input type="checkbox"/> University of Minnesota
	<input type="checkbox"/> University of Nebraska
	<input type="checkbox"/> Virginia Tech
	<input type="checkbox"/> Montana State University

Swine Extension in the Counties

- ☐ General Responsibilities
 - ☒ Livestock
 - ☒ Nutrient Management
 - ☒ Forages
 - ☒ 4-H Youth Livestock



Nutrient Management

- ☐ Senate Bill 1217 gives Extension lead role in providing required training to producers with liquid animal waste management systems.
- ☐ 2,746 Animal Waste Operators in NC
 - ☒ 10 hour training for certification
 - ☒ 6 hours CEU every 3 years for renewal
- ☐ 2,216 Permitted swine facilities

Youth Livestock Program

- ☐ 3,241 youth participated in swine projects and events in 2005
 - ☒ Market hog project
 - ☒ Pork cookery
 - ☒ Presentation
 - ☒ Record Books
- ☐ Livestock Judging
- ☐ Skillathon Contest
- ☐ Initiated NC 4-H Livestock Endowment

"The question remains, how have we been able to adapt Extension programs to a rapidly changing pork industry in NC and maintain relevance for Cooperative Extension?"

The answer is that we changed with the conditions, and we had and continue to have a coordinated program, a team approach and total involvement."

Dr. Miles T. (Todd) See, Extension Swine Specialist, 2007



Which way do we go from here?

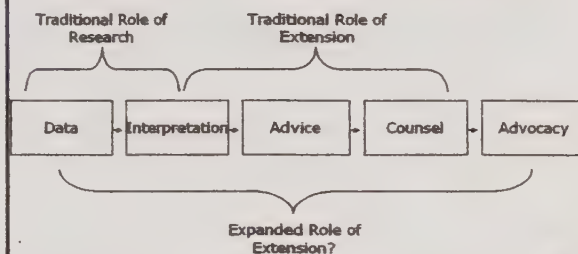


Which way do we go from here?

- ☐ Adaptive
- ☐ Responsive
- ☐ Cooperative
- ☐ Coordinated
- ☐ Greater Involvement in Basic Research
- ☐ Entrepreneurial Models
- ☐ Advocates of the Industry



Continuum from Data to Advocacy



Adapted from Blockstein, 2002



How to Maintain Credibility

- ☐ Follow the facts and tell the truth
- ☐ Obey the "rules" of science
 - Base interpretation upon data and conclusions that are peer reviewed
 - Explain how conclusions are reached
 - Present margins of error
- ☐ Present caveats
- ☐ Identify uncertainty
- ☐ Help to distinguish between uncertainty and guesswork
- ☐ Avoid hyperbole

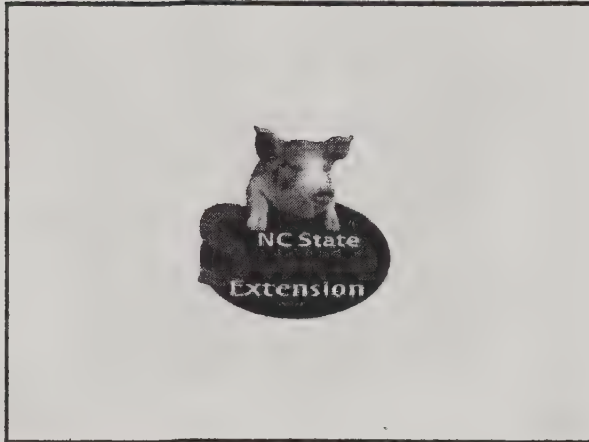
Adapted from Blockstein, 2002



"When all is said and done, more is said than done. But Extension thinks that if enough is said, something will be done."

Dr. James R. (Bob) Jones, Extension Swine Specialist, 1978





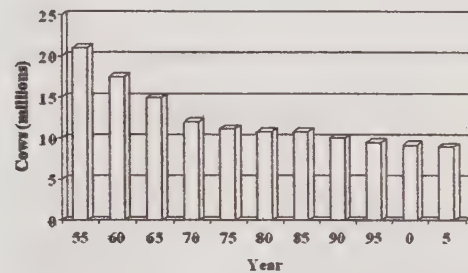
Panel: Adapting Extension to Rapidly Changing Industries

Ellen Jordan
Texas A&M University

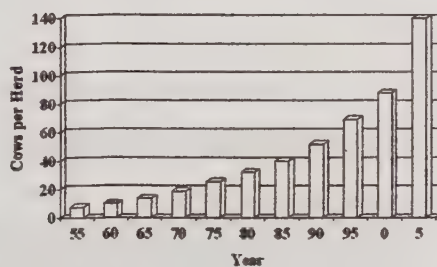
Adapting Extension to the Rapidly Changing Dairy Industry

Ellen R. Jordan, Ph.D.
Texas Cooperative Extension
The Texas A&M University
System

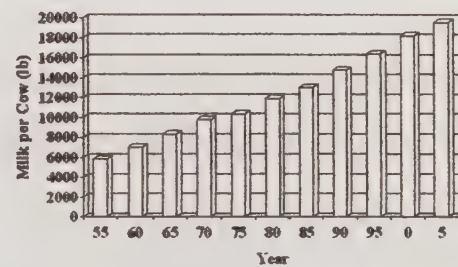
Trends in Dairy Cattle Numbers (1955 to 2005)



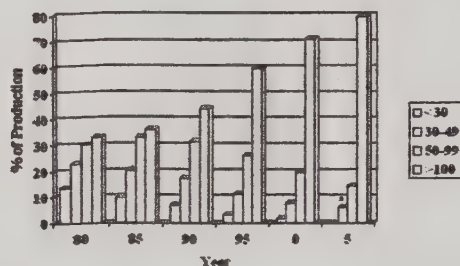
Changes in Average Herd Size (1955 to 2005)



Changes in Cow Productivity (1955 to 2005)



Changes in Percent of Production by Herd Size (1980 to 2005)



Changes in Dairy Extension

- Reduction in FTEs
- Joint appointments
- In-depth, research based information requests
- Emerging target audiences
 - Agri-service professionals
 - Farm employees

Chase et al., 2006

Methodologies

- | | |
|---|--|
| Traditional <ul style="list-style-type: none"> • On-farm demonstrations • Educational meetings • Fact sheets • Newsletters | Contemporary <ul style="list-style-type: none"> • Dairy-L • Internet resources • On-farm research • Focused meetings • Multipliers |
|---|--|

Technological Adoption



Five Stages of Adoption

- Awareness
- Interest
- Evaluation
- Trial
- Adoption

Transforming Extension

- Adult learning theories
 - Transformative Learning
 - Critical Reflective Theory
- Extension's role as a facilitator
- Knowledge co-creation (clientele directed)
- Interdisciplinary approaches
- Accountability

Franz, 2007

Triggering Event/Dilemma

- Two case studies/examples
 - Cooling pond ban
 - Poor reproductive performance

Triggering Event – Cooling Ponds

TDH Milk Information Release from October 30, 2001 stated that unsanitary cooling ponds "shall be drained, filled, or made inaccessible to cattle until such time as they have been replaced by an approved design."



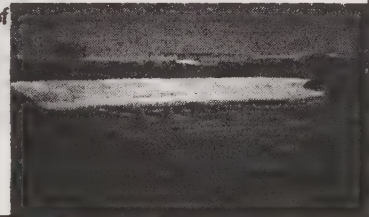
Appraisal of Assumptions

- Producer expressed need to combat heat stress and maintained sustainability.
- Non peer-reviewed data from Florida
- Traditional training



Exploration of Alternatives

- Survey to determine who was using and to obtain release for access of information.
- Procurement of from MMA
- Evaluation of available data
- CEAs
- Industry
- Veterinarians
- Media



Developing Alternatives



- Resolutions
 - TVMA, DFA
 - FDA, TDH, legislators
- Meeting with TDH
 - TVMA, DFA, TCE, FDA, ODH, industry, producers, media
- Development of guidelines

Integration of New Perspectives

- Milk Information Release 01-1 (Revised)
 - Per TCE guidelines developed in meeting with producers, regulators, industry facilitated by Extension
- NCIMS proposal to amend PMO
- FDA concurred with recommendation of NCIMS

Accountability

- Producer participation
- Change in state regulations
- NMC abstract/poster
- JDS peer-reviewed manuscript
- Change in PMO
- Economic impact



Dilemma – Poor Reproduction



- 5-10% CR in summer
- <50% HDR

Appraisal of Assumptions

- County committee questions technology implementation
- Impediments
 - Cost
 - Paperwork
 - Injection timing
 - Seasonal issues



Exploration of Alternatives



- Producer identified for on-farm evaluation
- Development of computerized lists
- Year-round programs
- Cost issue, ECP studies

Developing Alternative Perspectives

- Veterinarians
- Industry Representatives
- Producer meetings
- Media releases
- Internet resources



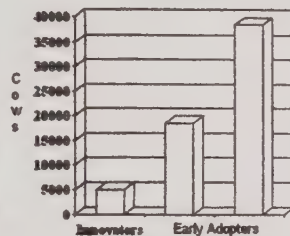
Integration into Daily Life

- Individual assistance
- Spread from innovators to early adopters and then to general dairy community
- Record software changes
- Industry promotion



Accountability

- Tracking of cows being influenced
- Peer-reviewed article publication
 - Jordan et al., 2002
 - Pancarci et al., 2002
- Tracking internet access of resources



Internet Technology

- Anticipate the needs of clientele
- Incorporate material from other institutions
- Deliver relevant material with minimal effort on part of clientele
- Hall et al., 2004 – limited beef cattle producer use of web-based material
- Rich Site Summary (RSS) feed of webcasts or podcasts

Employee Training



MilkCasts/LecheCasts

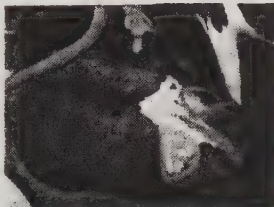
TexasDairyMatters.org

Percent of Producers Indicating Skill as Desired/Required

Job	Comm	Supervision	Problem Solving	Computer
Herd Mgr	86.8	71.1	86.8	76.3
Calf Mgr	79.2	54.2	75.0	54.2
Hfr Mgr	45.5	36.4	45.5	36.4
Milker	75.4	24.6	71.9	36.8
Feeder	82.4	41.2	82.4	50.0

Brasier et al., 2006

Materials for Non-English Speaking Audiences



- Culture
- Brevity
- Headings and subheadings
- 25 word sentences
- 60 word paragraphs
- White space

Ingram et al., 2004

Challenges to Transformation

- Global research perspective to local
- Publishing, peer reviewed or not
- Promotion and Tenure Committees
- Funding
 - Federal vs. State vs. Private vs. Producer
- Continuity of research
 - Extension associate (Ishler et al., 2006)
- New metrics required for learner directed programs and participatory research
 - Number of cows and value of change
 - Issues resolved

Adapting Extension

- Incorporate new technologies, but capitalize on techniques that allow clientele directed learning and participatory research.
- Maintain relevancy in rapidly changing industry.
- Expand the diversity of target audience – farm laborers, multipliers, environmentalists, animal welfare groups, etc.
- Educate promotion and tenure committees.

What is Extension's Responsibility in Responding to Emergency and Controversial Issues?

Jon Ort
North Carolina State University

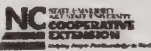
Extension's Responsibility in Responding to Emergency and Controversial Issues

Dr. Jon F. Ort

Joint National Extension Workshop
*Changing the Future
of Food Animal Production*

July 10, 2007

San Antonio, TX



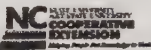
Our shared Extension mission

- 93 years: promoting economic prosperity and improving lives through education
- variation from state to state and county to county
- united in commitment to helping people put research-based knowledge to work
- disaster work grew out of emphasis on problem-solving in agriculture



Positioned to help clients understand controversial issues

- Expertise from colleges of agriculture, natural resources and design
- Creating agribusiness solutions:
 - cultural and husbandry practices
 - best use of land, water, other resources
- Addressing areas of societal concern



Extension's role and responsibilities

- policy: maintaining credibility in times of crisis and controversy
- State Animal Response Teams
- Extension Disaster Education Network
- SR-PLN's efforts to clarify role
- Regional animal biosecurity conferences



Extension's 5 key roles in hot issues

- forecasting trends
- advising clients
- facilitating discussion
- connecting parties with information
- informing through educational programs



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Issues are complex

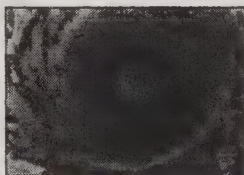
- Extension educators can
 - gain full understanding of conflicting viewpoints
 - conduct research that gets at the heart of issues
 - provide educational programs based on research



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Addressing disasters

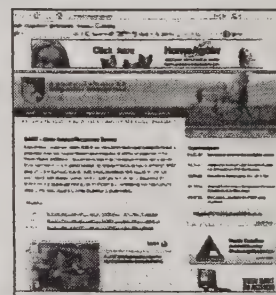
- Hurricane Katrina
- 9/11/2001
- Avian influenza
- B.S.E.
- More



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State Animal Response Teams

- County and state levels
- Agents sometimes serve as coordinators
- Agents sometimes serve in supporting roles



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State Animal Response Teams

- Building capacity to respond
- Extension must be on the team
- Relationships best developed and maintained in advance



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Extension Disaster Education Network

- Formed following 1993 floods
- For producers, others
- Weather, disease, terrorism
- Cross-state collaborations



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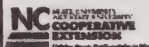
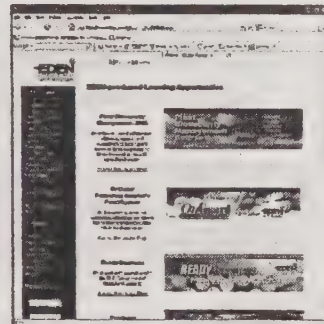
Expanded focus, shared resources

- 16 issue pages
 - Agrosecurity
 - Anthrax
 - Avian Influenza
 - BSE - Mad Cow Disease
 - Children and Disasters
 - Classical Swine Fever
 - Foot and Mouth Disease
 - Mold
 - Pandemic Flu
 - Plant & Crop Security
 - StormReady
 - Sudden Oak Death
 - Tornado
 - Tsunami
 - West Nile Virus
 - Hurricanes



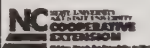
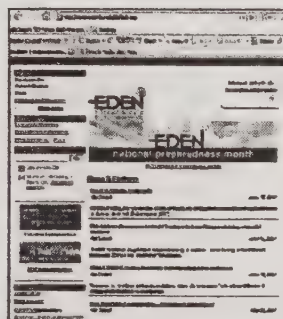
EDEN's online courses

- plant biosecurity
- pandemic preparedness
- business preparedness
- food system protection
- USDA's role in national response plan



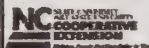
EDEN and eXtension

- Fall launch:
 - flooding
 - animal biosecurity
- Future:
 - much more



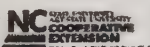
Southern Region Program Leadership Network and EDEN

- EDEN facilitated program leader discussions of Extension's roles
- Goals:
 - clarify role, capacity
 - create understanding
 - develop emergency assistance compact



Regional Animal Biosecurity Conferences

- Develop relationships
- Foster understanding
- New Mexico, Pennsylvania, South Carolina

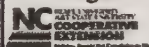


Our role in crisis, controversy, disaster

- Conducting applied research
- Educating stakeholders, public
- Facilitating decision making

rather than

- Advocacy
- Regulation



Extension: A trusted source

- Credibility
 - essential to educational mission
 - our future depends on it.



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